

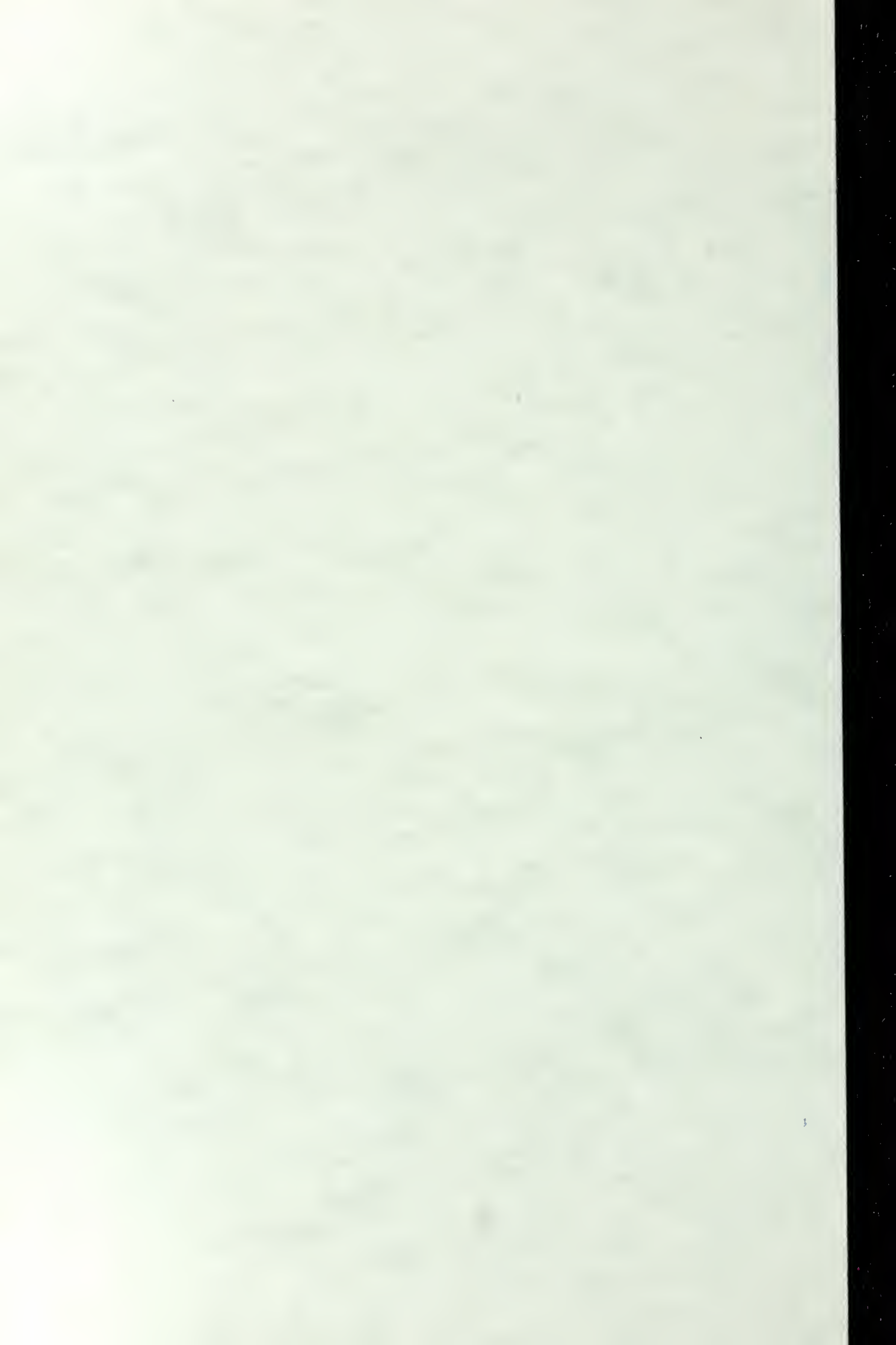
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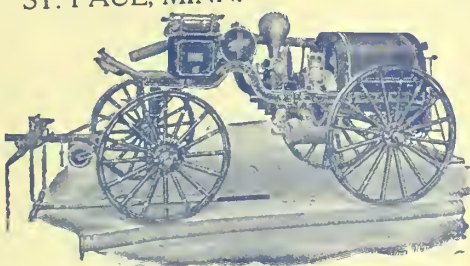
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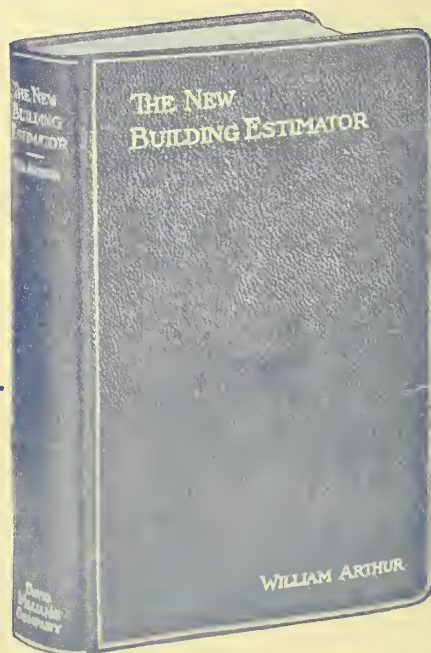
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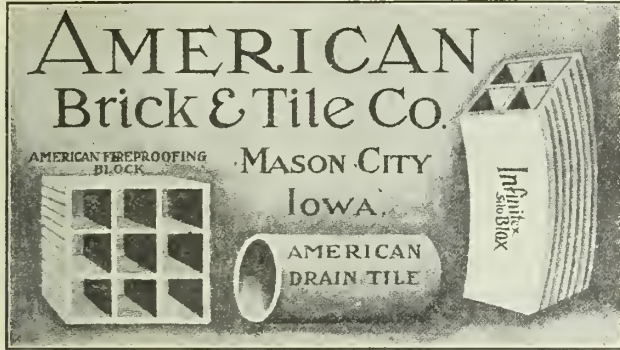
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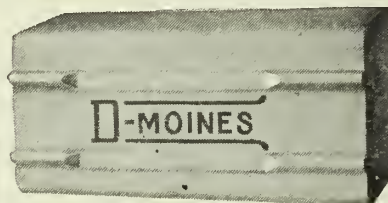
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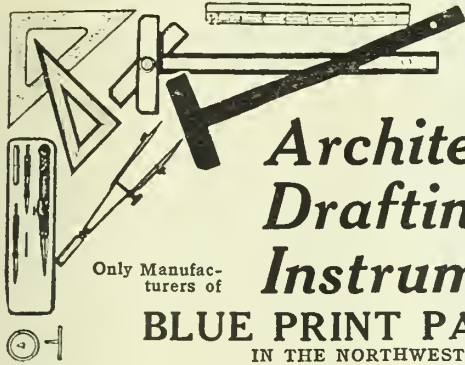
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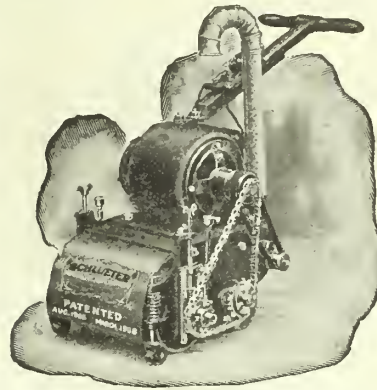
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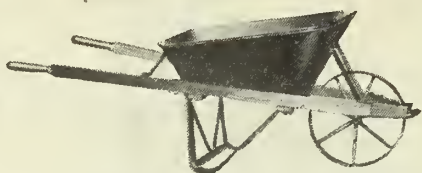
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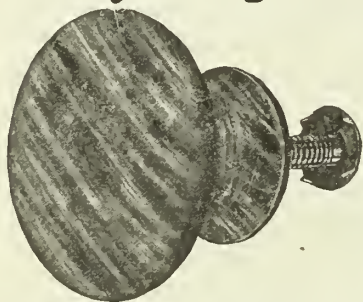
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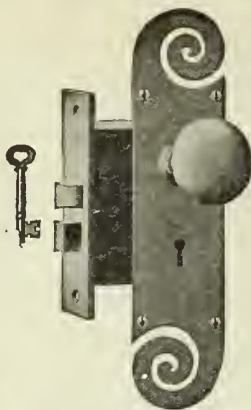
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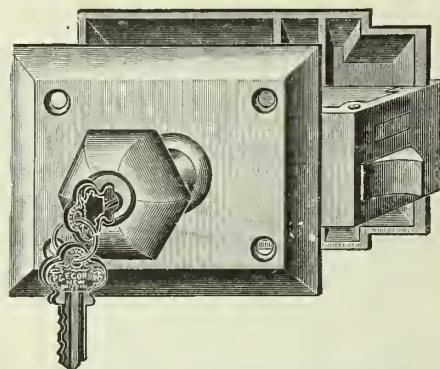
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EDITORIAL

O. L. COLBURN, EDITOR



BENEFITS OF A BUILDING COLLAPSE.

Thorough investigation of the building accident at Cedar Rapids are being made by the authorities and interested organizations, including the Master Builders of Iowa. President Leefer, of this organization, says no stone will be left unturned to get the facts and prepare a report based on expert knowledge. In an excellent editorial on "A Call to Action in Iowa," The Engineering Record says:

The revamping of building ordinances in Iowa cities, following the recent building failure in Cedar Rapids, will undoubtedly occupy the attention of many councils during the coming winter. No more opportune time will ever present itself for engineers and architects to throw themselves into civic work and to guide the discussions into reasonable channels. With the daily newspapers full of engineering terms relating to stresses, factors of safety, form work and the effect of low temperature on concrete, technical men should lend all possible assistance to those who are so aroused that something constructive can be done.

Regardless of the cause of and responsibility for the failure at Cedar Rapids, a definite starting point for action has been marked. No higher service can be rendered to the state by the technical societies than to assist in framing and passing adequate building ordinances.

IMPROVEMENTS FOR THE BULLETIN.

The new size and cover in which The Bulletin is printed this week, will, we feel sure, be found acceptable by our readers. It is not only more handy and convenient to read but it conforms more nearly to the standard size of trade magazines today.

Another little point,—and one that is worth while,—is that this very slight difference in size means, with our circulation, a saving of several hundred dollars on our paper bill. This money we can then devote to making further improvements for the benefit of Bulletin readers.

Several arrangements recently made, give us more complete news from the Northwest and Western Canada than can be found in any other building paper. But if you happen to know of any news we still are missing, do not hesitate to say so. Better still, give up a complete report of it yourself by the next mail.

HARMONY OF ALL CITY ARCHITECTURE.

In a recent issue The Improvement Bulletin had a word to say of the opportunity which offers on Nicollet and Hennepin avenues, and on Washington between them, which comprises the frontage facing Gateway Park, to harmonize in excellent architecture all the new structures, and as many of the old as possible, with the general style of the proposed twin union station. A possible Jarisian effect was noted. A writer in the Pacific Builder and Engineer of Seattle, also seeking harmony, makes the daring suggestion that all architecture of a city be given one general style, or a pleasing, carefully chosen variety of designs which do not clash but unite or blend for the big civic aim of the city beautiful. He goes so far as to urge a city architect for every ward. In Minneapolis there would be thirteen ward architects. If the salary which the advocate of this plan suggests were paid them, the thirteen would receive \$50,000 to \$60,000 a year; and they would receive five per cent of the cost of the structures. Above them all would be the city architect-in-chief, possibly at \$7,500. Minneapolis would then have fourteen architects, all assured of a fairly good income—and no other architects. They would do all the work. There are now forty or fifty and yet the city and citizens go East and South for plans. The Museum of Art and the new Central high school, for instance. Branch libraries of the public library, another instance. The Great Northern station was not built by the city or a citizen so its Chicago architects are not to be considered at this time.

One of the actual conditions which the author of the ward architect plan may not have realized fully is that a great many buildings in American cities, Minneapolis included, are built without architects. With remarkable frequency it is noted on our building permits, "architect, none;" or the space left for the architect's name is significantly blank. City health and safety are looked after by building inspectors. Free America leaves the owner, from boilermaker to millionaire, unrestricted in his choice of design. The result of course is a lot of awful stuff.

But our city is built now; it has only to grow larger. A city ward architect ordinance could not be retroactive. It has been a hospitable city, welcoming all who would come here to live and enjoy its advantages. I would hardly wish to say to the architectural world: Minneapolis needs fourteen architects; no more, no less; we have them.

The writer in the Pacific Builder and Engineer says: "Architecture will never accomplish its principal underlying purpose of beautifying the city until each city has its architect-in-chief, and every ward in the city has its ward architect who shall have complete charge of all work in his ward—and who shall be employed permanently, as long as satisfaction is given, and who shall receive a minimum living salary and five per cent upon all the work he may do. It will naturally be his aim to make the ward beautiful as a whole. This does not mean that buildings shall be alike, but that they should harmonize one with the other. The best architects to be selected for the most desirable wards upon the merits of executed work, or by examination, or both.

"This arrangement would result in a greater saving to the architect with no more expense to the owner than at present. The work would come to the office of the architect without entertainment or bait, and he would receive his total fee."

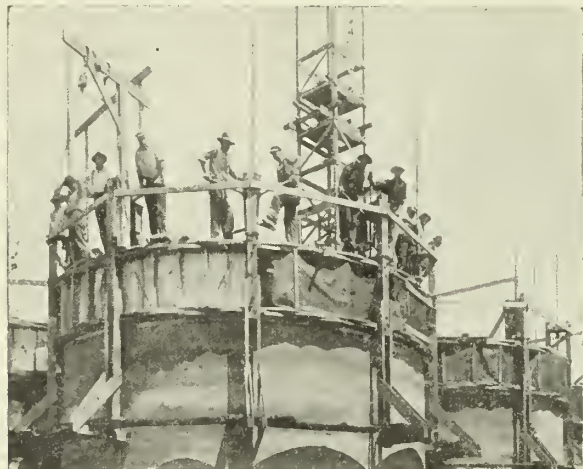
A Modern Grain Elevator at Minneapolis

The Gould Elevator Co., of Minneapolis, are now using a new 508,000-bushel reinforced concrete grain elevator, consisting of eighteen tanks, each having a diameter of 22 feet and a height of 91 feet from the foundation level to the floor of the working chamber on top. The thickness of the walls is 7 inches

Interesting Details of a Re-inforced Concrete Structure 500,000 Bushel Capacity.

The cupola is entirely of concrete construction and is one-half the width of the double bin. The lower 2½ feet of its side walls are, therefore, built as girders spanning the diameter of the bins. Above this girder they are 8 inches thick and support a roof system of reinforced concrete girders cast integral with a 3½-inch concrete roof slab. The pilasters are placed in the outside of the wall, giving a paneled effect. A cornice similar to that used around the tank has been built on the cupola.

These tanks were cast with sliding metal-lined forms, a



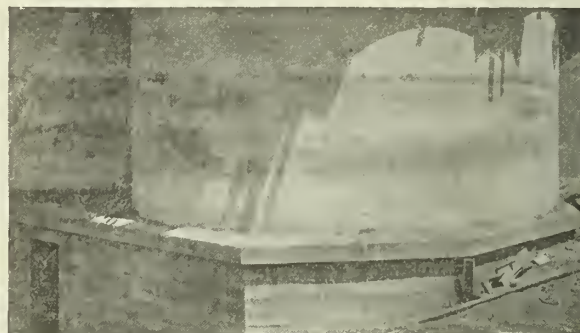
Form System Used on the Gould Elevator, Minneapolis.

at all heights and the reinforcement is of ½-inch steel on 6½-inch centers at the bottom, increasing toward the top.

It has been customary to build a circular cornice on grain tanks of this type, but this involves some difficulty in construction which has been avoided in this case by building an hexagonal cornice, using forms of straight lumber set on top of the sliding forms after the last of the circular wall had been cast. The cornice consists of a simple 2-inch offset, a 12-inch surface inclined 45 degrees to the vertical and another 2-inch offset which, in the hexagonal shape, is neat in appearance and suitably finishes off the tank.

The bins have 4-inch reinforced concrete conical hopper bottoms placed on a cinder fill, the slope of the bottom being 8:12.

The bins rest directly on a 12-inch floor which is supported in turn on a series of walls, hexagonal in plan, which transmit the load to a 2 foot 6 inch foundation slab. The space between the 12-inch floor and the foundation slab is unused except for a central passage-way the full length of the bins, which is used for conveyor belts.



Foundations of the Gould Elevator.

complete set being built for the eighteen tanks, and raised by means of jacks, one section at a time. The face of the form was four feet high. Some difficulty was encountered on account of the sun causing one side of the work to set more quickly than the other and to obviate this tar paper was fastened on the outside of the exposed side. Furthermore, the contractor believes, after experimentation with both steel and wood-lined forms, that the latter are easier to move and equally efficient. Three elevators were under construction by this company during August, 1913, using wood forms and following these another was built at Manitowoc, Wisconsin, for the Manitowoc Malting Co., using wood-lined forms, soaked in oil before setting up. These showed no tendency to baking on the sunny side nor did the concrete stick to the forms at any time.

The Witherspoon-Englar Co., of Chicago, was both engineer and contractor for the work.



Grain Tanks of the Gould Elevator Co., Minneapolis.

STEEL GIRDER CUT WITH FLAME.

Cutting through a 4-foot steel girder with an acetylene-oxygen flame as though it were so much cheese, a workman on the new Great Northern station, Minneapolis, severed the massive piece of steel in twenty minutes, a task which would have taken a crew of men three days under the old method with files and other tools. By this means all the old steel girders and columns supporting the Hennepin av. viaduct are being cut away to make room for new ones, and a rearrangement of tracks that will provide twelve tracks where now there are only six. George Bjordahl, an employe of the Brown Sheet Iron & Steel Works, which is doing the cutting for the Pittsburgh Construction Co., sat on a scaffolding with a blow-pipe in his hand, its flame fed from two tanks one containing acetylene and the other oxygen gas. With this intense heat he quickly severed the steel. The girders are half an inch thick.

RAILROAD RIVALRY IN THE WEST.

Frank Wegner, of Libby, Mont., upon returning recently from Fernie, B. C., said the Canadian Pacific was active in the Elk River district. Work is being done on a branch from the main line which runs from Fernie to Elko, paralleling the Great Northern that distance. When the line was built down that stream the statement was made that it was built for the purpose of participating in the business created by the Baker Lumber Co., operating a large saw mill plant at that place. Mr. Wegner argues that for the purpose of taking care of that traffic it is far from necessary to go to the great expense which the company is going in now, ballasting the line.

A glance at the map will convince anyone that the Canadian Pacific people do not intend stopping at Elko, which is at the confluence of the Elk river and the Kootenai river. From that place the company will undoubtedly extend the line on west and it is presumed by those who are familiar with the lay of the country and the plans of the company, in so far as the latter can be determined by the activity of those who have charge of it, that the plan is to extend the line on down the Kootenai river from its present terminus to Bonners Ferry. This line would parallel the Great Northern all the way, taking the opposite side of the Kootenai from that now occupied by the Great Northern. This would put Libby and Troy and Warland and all other places along the Kootenai on two transcontinental roads. The completion of the line, or rather the extension of the line, from Elko to Bonners Ferry along the Kootenai would give the Canadian Pacific the desired line without heavy grades and would put that company on same footing through this part of their territory with the Great Northern, so far as grades are concerned. From Libby to Elko is about 70 miles and from Libby to Bonners Ferry is 50 miles. Aside from the great desire for better grades this would enable the Canadian Pacific people to share in the business along the Kootenai river which has already been created and would land that in the middle of the greatest forest in the United States today, the northwestern part of Montana, in Lincoln county alone there being over twenty billion feet of standing merchantable timber.

This actual work on the part of the Canadian Pacific dovetails into reports which were brought to Libby last summer by Robert Hess who that time returned from an extended trip over into Canadian possession. He reported having run across surveyors in the field along the Kootenai river south of the present terminus of the road at Elko and had an opportunity to overhear the engineers talking about the work which they were then doing in the field. That the Canadian Pacific intends coming down the Kootenai has been taken for granted for a long time, and this activity at this time of the year, whereby that company is apparently getting everything in readiness to the end of its constructed line, looks as though they intend pushing right along down the Kootenai river during the coming spring and summer. As the line would probably be not over 120 miles, following an easy grade and with but little difficult construction, it could probably be shoved through in a single year.

With this line coming down the Kootenai river and the recent announcement by James J. Hill, that the Libby cutoff would be running inside of two years, the chances are splendid that considerable of the railroad activity of Montana is soon to be shifted to the Kootenai valley. And following along with these lines it is no longer any secret that the Milwaukee intends coming into the Flathead valley to Kalispell and that it will continue on west to the Kootenai valley and probably tie onto the Canadian Pacific at this point.

This would give the Milwaukee an opportunity to tap all of this great territory with its through trains and at the same time allow that company to transport all the timber which the Big Blackfoot Lumber Co. owns in Flathead and Lincoln counties, to say nothing of its share of the other business along the proposed line. When it is recalled that the Big Blackfoot company, which

(Continued on page 14.)

NEW BANK BUILDING, FERGUS FALLS.



Fergus Falls, Minn., has a new bank building of unusually handsome appearance, the Scandia State Bank's structure. It has just been occupied by the bank. It makes a most creditable showing for Minnesota's permanent improvements. The building and lot represent an investment of \$30,000. The front is Bedford stone. The interior downstairs is in English vein Italian marble, with dark green trimmings. The wood work is mahogany and the floor is a mosaic—all in good taste and satisfying to the most sense of beauty. The general contractor was J. P. Johnson, of Fergus Falls, and the interior contractor was A. Moorman & Co., of St. Paul; architect, A. Moorman of St. Paul. The marble works was put in by the Drake Marble Works of St. Paul; the vault finishing by the Diebold Safe & Lock Co., of St. Paul; the plumbing by M. Frankowitz of Fergus Falls; heating (hot water) by H. P. Langdon, of Fergus Falls.

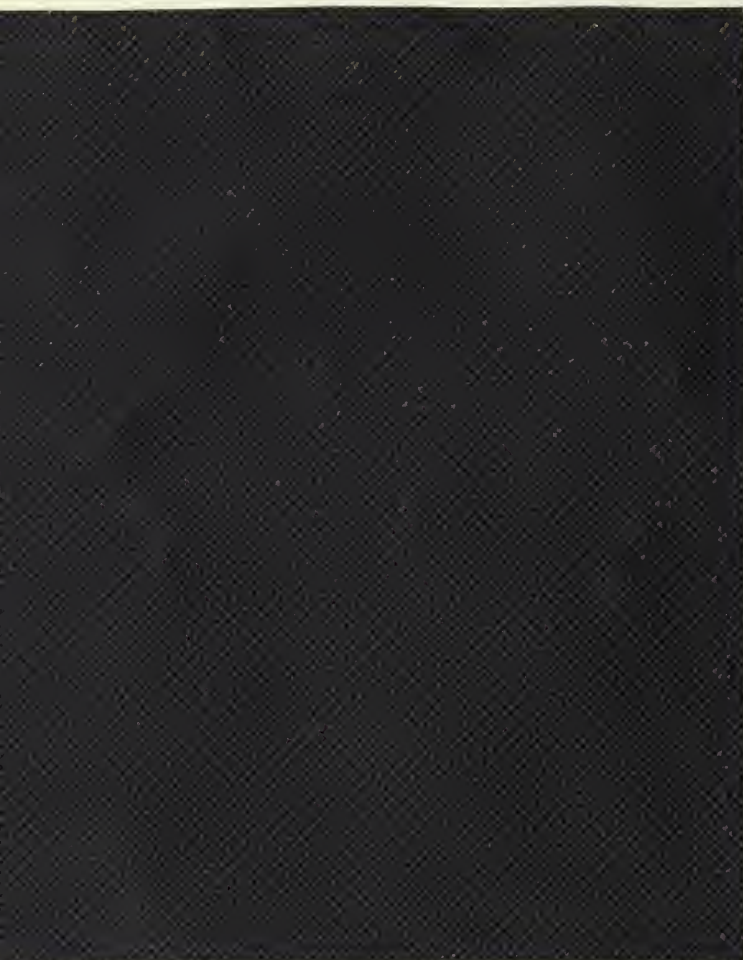
A. G. Anderson, cashier, states that all of the contractors have done good work and especially commends J. P. Johnson for the work he did as well as A. Moorman & Co., who were always willing to do everything possible to make it a first-class job.

RAILROAD RIVALRY IN THE WEST.

(Continued from page 13.)

is a subsidiary of the great Amalgamated company, which, in turn, is owned by the same interests which control the Milwaukee, owns over a half million acres of the finest timber lands in Flathead and Lincoln counties, it can easily be seen that this company has enough tonnage of its own to justify the erection of its own railroad to haul it to the markets.

And then again, it may be that the recent announcement made in Libby by John R. Toole, president of the Big Blackfoot Lumber Co., that he would recommend the early construction of a big saw mill at Libby, was made with some definite information as to future railroad construction through the territory in which his company proposes to operate.



PUBLIC IMPROVEMENTS, NORTHWEST.

Engineering preparation for large fresh water harbor, extending from the Gulf of Georgia to New Westminster, B. C., with anchorage for the biggest ships now entering Vancouver, have been started. About \$16,000 will be raised for the engineer's salary, and it is expected \$20,000 will cover the cost of the complete harbor plan. The Dominion government is expected to aid the progress by taking the debentures, and bids have been asked for a jetty, to cost \$200,000, at North Arm.

United States treasury estimates submitted to congress this week, include \$175,000 for completion of the Minneapolis postoffice; \$175,000 for completion of high dam. The war department asks \$1,500,000 to carry on the work for a six-foot channel, between Minneapolis and the Missouri, in the Mississippi. The government estimates for Mississippi river expenses between Grand Rapids and Brainerd, \$8,000; improvement of Mississippi reservoirs, \$30,000; Agate Bay, Minn., \$5,000; Warroad river, Ann Arbor, \$2,000; Zippel Bay, Lake of the Woods, \$1,000; improvements, Red River of the North, \$7,500; upper Missouri, Sioux City to Fort Benton, \$150,000.

Estimates have been submitted to congress of \$100,000 for irrigation on Flathead reservation; \$50,000, Blackfeet reservation; \$50,000, Ft. Peck reservation.

For new roads in Glacier National Park and Yellowstone Park, an appropriation of \$150,000 is asked of the new congress. An estimate of \$162,000 is submitted for improvement and care of Hot Springs sanitarium.

BRICK AND TILE NEWS

FACE BRICK DEALERS' MEETING.

Face brick dealers everywhere are not only invited but urged, to attend the annual meeting of the Face Brick Dealers' Association of America which will be held at French Lick, Ind., Dec. 10, 11 and 12. French Lick is the home of the famous French Lick Springs. According to a previous ruling of this association, it is its declared purpose to hold its annual meetings at the same place and time as those of the American Face Brick association. As announced in October, the American Face Brick association will likewise meet at French Lick, their convention to be held Dec. 10 and 11. At least one joint session will be held by these two organizations. It is primarily the purpose of the Face Brick Dealers' association to deal with problems that confront the dealers of face brick. It is also intended to bring about a closer and friendlier relationship with the manufacturers, to the end that their mutual problems may be intelligently discussed and the many abuses now existing entirely corrected.

OBJECTS OF THE FACE BRICK DEALERS' ASSOCIATION.

As set forth in their constitution, the objects of the recently organized Face Brick Dealers' association (annual meeting, Dec. 10-12, at French Lick, Ind.) are as follows:

"To promote cordial and friendly relations among members and between members and manufacturers, thereby removing, so far as possible, misunderstandings and ill feelings due to spreading of false reports and baseless charges, and to ignorance of conditions prevailing in the industry.

"To collect and disseminate accurate information concerning the manufacture and sale of face brick and other building materials, including correct statistics regarding the capacities and outputs of any and all plants engaged in the manufacture of face brick, together with periodical reports regarding outputs, shipments, orders and prices; to collect, compile and publish accurate information regarding labor conditions, and any and all conditions affecting the industry generally; it being one of the underlying convictions of the association that intelligent competition is far better for the industry than ignorant; and that the public buying such materials will share in the profits gained by the elimination of much waste. In this connection, it is one of the objects of the association to ultimately make the information gathered official in character and publish statistical results for the information of the general public.

"To maintain high and uniform standards in the manufacture and sale of face brick to the end that customers may be assured of the quality of such materials as they may purchase.

"To devise ways and means for promoting the use of face brick.

"To take up, intelligently discuss, and so far as may be legally done, correct abuses in the many traffic problems which can be dealt with only by an organization.

"To co-operate with customers, manufacturers, and with each other in the correction of unfair and pernicious practices and customs, and, in this connection, to work out, so far as practicable, uniform contracts which will be fair and satisfactory to the trade and to the public.

"To introduce the open price policy; i. e., to bring into the open all competitive conditions, without, in any manner, directly or indirectly, restraining the freedom of any member to quote such price as he pleases, each member being free to compete, both with members and with non-members of this association, and to the same extent as though this association had no existence."

Geo. Schwartz of Ricketson & Schwartz, Milwaukee, is a vice president.

TELEPHONE COMPANY COMPLIMENTS VENTILATING SYSTEM.

In a letter to the Hackney Ventilating Co., Minneapolis, the Tri-State Telephone & Telegraph Co. says:

"It certainly gives us pleasure to state some facts in reference to the Hackney ventilating system used by our company at the Minnesota state fair.

"Our switchboard and five operators, on account of the noise, had to be enclosed in a glass cage 12 feet by 10 feet by 14 feet high, which was practically air-tight. It would, in our opinion, have been impossible for our girls to operate in this cage had it not been for the fresh air brought in by your ventilating system. As it was, we believe our girls who were exceptionally busy, had the most comfortable place on the fair grounds. We also had our public booths ventilated by your system which proved to be entirely satisfactory to us and especially so to our patrons who used our booths."

PERSONAL AND GENERAL NEWS

Doings of the Northwest this Week Boiled Down for Busy Readers

ARCHITECTS AND ENGINEERS.

"Make no little plans; they have no magic to stir men's blood, and probably themselves will not be realized. Make big plans; aim high in hope and work, remembering that a noble, logical diagram, once recorded, will never die, but long after we are gone will be a living thing, asserting itself with ever-growing insistency. Remember that our sons and grandsons are going to do things that will stagger us. Let your watchword be order and your beacon, beauty."—D. H. Burnham.

Edwin H. Hewitt, Minneapolis, is president of the Minnesota chapter, A. I. A., for the coming year and Thomas G. Holyoke, St. Paul, vice president. E. H. Brown, secretary and treasurer. Board of directors: One year, H. H. Orth, St. Paul; G. A. Chapman, Minneapolis. Two years, W. G. Purcell, Minneapolis; J. W. Stevens, St. Paul. Committee on public information: G. A. Chapman, chairman; J. W. Stevens, V. F. de Brauwere. Committee on legislation: W. W. Tyrie, chairman; H. T. Downs, Ernest Kennedy. Committee on membership: J. P. Jackson, chairman; C. B. Chapman, E. S. Stebbins. Committee on civic improvement: William C. Whitney, chairman; Anthony Morell, Thomas G. Holyoke. Committee on education: W. G. Purcell, chairman; Prof. F. M. Mann, Jacob Stone, Jr. Committee on competitions: Harry W. Jones, chairman; William Kenyon, L. A. Lamoreaux.

W. D. Maxwell, county engineer, Sac City, Iowa, and R. B. Skinner, assistant superintendent Cuban Engineering & Contracting Co., Carroll, Iowa, have been elected associate members of the American Society of Civil Engineers.

Thayer Stoddard, a civil engineer who has been employed with Swearingen & McCulloh on the water works system at Cascade all the working season, arrived in Great Falls on Sunday and will be connected with the engineering company's local office. The work at Cascade has been closed.

Peace seems to have settled down over John W. Bennett, author of St. Paul's new charter, and the Engineers. In a public letter Mr. Bennett says that recently as a guest of the engineers' society committee, he went over the ground with the committee. He pointed out to the members that the council might by ordinance place an engineer at the head of city building inspection. The two members of the committee present, Messrs. W. E. King and G. W. Rathjens, indicated that this would be satisfactory to the engineers, provided the inspector was made to report directly to the commissioner of parks, playgrounds and public buildings.

PROGRAM FOR IOWA CLAY PRODUCTS MANUFACTURERS' ASSOCIATION MEETING.

Following is the program for the thirty-third annual convention of the Iowa Clay Products Manufacturers' Association, at Des Moines, Dec. 10-12:

WEDNESDAY, DEC. 10th, 10 A. M.—President's Annual Address, H. R. Straight, Adel, Iowa; Testing Drain Tile, Prof. A. Marston, Dean of Engineering Department, Iowa State College, Ames, Iowa; The Cost of Production Now and Ten Years Ago, D. F. Morey, Ottumwa, Iowa; Keeping Down Cost; Watching Quality, H. L. Trapp, Creston, Iowa; The Open Price System, Iverson C. Wells, Editor "Brick and Clay Record," Chicago; General Discussion on Raising Quality Standards.

WEDNESDAY P. M., 2 O'CLOCK—A Manufacturers' "Territory," J. L. Platt, Jr., Van Meter, Iowa; Advertising: How It Can be Used Profitably to Increase the Business of the Individual Manufacturer, Paul B. Lessing, Des Moines, Iowa; The Wise Man and His Profits, W. U. Turpin, Ft. Dodge, Iowa; Lowering Cost of Insurance by More Fireproof Factory Construction, O. W. Follett, Home Ins. Co., Des Moines, Iowa; The New Short Course for Clay Products Manufacturers at Iowa State College, J. Will Parry, Ames, Iowa.

Evening meetings of Tile, Block and Brick Manufacturers will be arranged for.

THURSDAY A. M., 10 O'CLOCK—A Talk on Clayworking in Iowa State College, Ames, Iowa; Discussion of Clay Roofing Tile, Chas. Stolp, Des Moines, Iowa; Pushing the Use of Hollow Tile in Fireproof Construction, F. Titterton, Rock Island, Ills.; Local Advertising: How It Builds a Demand, C. R. Madson, Algona, Iowa; Discussion of Different Methods of Burning.

THURSDAY P. M., 2 O'CLOCK—Permanent Farm Buildings, Prof. J. B. Davidson, Iowa State College, Ames, Iowa; A Discussion of the Farm Market for Clay Product, T. W. LeQuatte, advertising manager Successful Farming, Des Moines, Iowa; The Use of Producer Gas in Burning Periodic Kilns, I. M. Justice, Dayton, Ohio; Why Direct Selling is Not Desirable, Either as Affects the Manufacturer or the Consumer, C. L. Smith, Mason City, Iowa.

FRIDAY A. M., 10 O'CLOCK—Clay Products Manufacturer's Reciprocal Insurance, R. C. McMahan, St. Louis, Mo.; The Principles and Application of Smokeless Combustion, E. W. Wagenseil, Des Moines, Iowa; Pointers on Routing and Other Freight Matters, Walter Huenke, traffic manager, Iowa State Manufacturer's Association, Des Moines, Iowa.

Reports of Committees. Report of Secretary and Treasurer. Election of officers. Adjournment.

PERSONAL AND GENERAL.

J. O. Shulind of Shulind & Co., general contractors of Alexandria, Minn., was in the Twin Cities this week on a business trip. The company has become one of the successful bidders for government work and in this field have gained prominence within the year. They are finishing contracts at the Mahnomen Indian school building and three buildings on the White Earth reservation. The company is building three Indian school buildings in Wisconsin and has a good deal of work at home in Alexandria. Mr. Shulind says Alexandria's "White Way" is a certainty. It will be built next spring. A good deal of building and better buildings are predicted for Alexandria in 1914.

H. H. Boomer, of the firm of Boomer & Hughes, of Spokane, who have the contract for all the rock work for the Thompson Falls Power Co., was in that city recently consulting with his local representative, Gilbert Thomsen, who is manager in charge.

President J. F. Leefer of the Master Builders' Association of Iowa, who is a general contractor at Cedar Rapids, states that negotiations are under way to engage C. A. P. Turner of Minneapolis to investigate the Lyman building collapse. Mr. Turner is the inventor of the "mushroom" system of reinforced concrete construction, and an expert building engineer of long experience in construction of large edifices in all parts of the country. Mr. Leefer says the investigation will be conducted in a most thorough manner, and a report made on the most expert knowledge of construction that can be secured.

The MacArthur Concrete Pile & Foundation Co., 11 Pine st., New York, has been awarded the contract for the concrete pile foundations for the Philadelphia Suburban Gas & Electric Co. retort building at Chester, Pa. R. C. Cornish, engineer of gas company.

The MacArthur Concrete Pile & Foundation Co., 11 Pine st., New York, has received the contract for installing the concrete pile foundations of the new fire house for the city of New York on Richardson st. near Leonard st., Borough of Brooklyn. F. J. Felgenhauer Co., 4 Court Square, Brooklyn, contractor. Morgan & Trainer, 331 Madison av., New York, architects.

The Builders' Exchange of St. Paul held its annual meeting at the club rooms in the Ryan building Tuesday afternoon. Nearly 150 members were present. The officers who have served during the past year were re-elected: F. H. Romer, president, J. H. Hoffman, first vice president, Olaf Ewenson, second vice president, O. Lampland, treasurer and A. V. Williams, secretary.

The Northwestern Marble & Tile Co., in order to more efficiently serve its many St. Paul patrons and friends announces the opening of a St. Paul office and sample room at No. 812 Pioneer building, in charge of Mr. Geo. T. B. Warner. The company is prepared to submit samples and estimates covering all requirements in fireplace goods, marble, tile, etc., and has the most modern facilities which will insure prompt and considerate attention.

Ernest Edwards Poole, contractor, Regina, Sask., was in the Twin Cities this week.

RIGHT TEMPERATURE IN THE HOME

WITH this perfect device you can determine exactly the inside temperature regardless of outdoor conditions or variations—whether 20 below or 40 above. All adjustments are made instantly from the thermostat which has its place out he wall in the living room.

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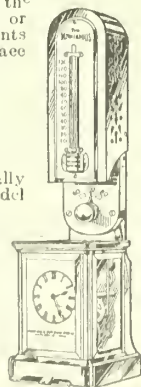
With 8-day Clock Time Attachment

The clock attachment enables one to secure automatically and silently a change of temperature at any set hour. Model No. 60 (same as illustration) shows 8-day clock.

The "Minneapolis" is the "original" and "best" heat regulator—the standard for over 30 years.

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CONSTRUCTION AND CONTRACT NEWS

OF SPECIAL VALUE TO ENGINEERS, CONTRACTORS, BUILDERS AND MANUFACTURERS

MINNEAPOLIS, MINN.

Office: 912 Lumber Exchange. Phones: N.W. Main 3902; T.S. 2194.
Please telephone news not later than Wednesday.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

A. G. Dunlop, 3217 5th av. S., concrete foundation and alterations	2,000
John Hagberg, 3940 41st av. S., 1½-story frame dwl.; Axel and Henry Olson Co., builders	2,400
Bernhard Johnson, 3709 26th av. S., 1½-story frame dwl.; Axel C. Oas, builder	1,000
Mitchell Gebb, 5036 S. Vincent av., 1½-story frame dwl.	2,500
Minneapolis Bedding Co., Polk st. and N. P. tracks, 1-story frame warehouse	1,250
Frank Peterson, 3217 47th av. S., 1½-story frame dwl.	1,500
Robt. K. Preston, 3416 39th av. S., 1-story plaster veneer dwl.	1,000
Andrew Rantio, 1018 Oliver av. N., 1½-story plaster veneer dwl.	1,000
A. F. Gaspar, 2606 N. Newton av., 1½-story frame dwl.	1,600
John J. Courtney, 1313-23 W. 25th st., 2503 S. Girard av., 3-story brick flats (6); J. M. Hoy, builder	18,000
J. F. Bostrom, 3817 10th av. S., 1½-story frame dwl.	2,500
Pittsburgh Coal Co., 2832 S. Emerson av., frame coal bins, 1-story office buildings (2) and coal shed	15,500
Ture M. Carlson, 4324 12th av. S., 1½-story frame dwl.	1,100
E. P. Stenquist, 2546 Girard av. N., 1-story frame dwl.	1,000
Alfred Rundquist, 3405 S. Girard av., 1½-story frame dwl.	2,000
Mary A. Hanke, 2400 S. Dupont av., alterations	1,500
D. L. Jacobson, 3101-05 W. 50th st., 2-story plaster veneer stores (3) and flat	3,500
F. W. Pohl, 1231 N. Oliver av., 2-story plaster veneer duplex, S. Ruseth, builder	4,200
Dahlstrom, 4036 Aldrich av. S., 1-story plaster veneer dwl.	2,500
E. Q. Stone, 2908 12th av. S., 2-story plaster veneer duplex	3,000
Hicks & Co., 894 21st av. SE., 1½-story frame dwl.	1,500
Hicks & Co., 890 21st av. SE., 1-story frame dwl.	1,300
W. H. Evans, 4228 Garfield av. S., 2-story plaster veneer dwl.	3,500
F. W. Hallberg, 319-21 W. 48th st., concrete foundation	1,200
Minneapolis Brewing Co., 1212 Marshall st. NE., 1-story brick and steel garage, Wm. Siegman, builder	4,500
United States Register Co., 2109-11 Cedar av., 2-story brick factory, W. H. Arrell & Co., builders	13,000
Gust Vedin, 3233 16th av. S., 2-story frame addition to dwl.	1,500
Board of Education, 245 9th av. N., 1-story brick garage	1,000
O. B. Currier, 3900 2d av. S., 1½-story frame dwl.	2,000
A. F. Lonn, 3224 25th av. S., 1-story plaster veneer dwl.	1,200
Albert Anderson, 2643-45 Elliott av., 2-story plaster veneer flats (4) and 2-story plaster veneer flats (4)	8,000
Albert Anderson, 2651-53 Elliott av., 2-story plaster veneer flats (4)	8,000
Albert Anderson, 2647-49 Elliott av., 2-story plaster veneer flats (4)	8,000
Margaret McGrath, 1413-15 3d av. S., 2-story brick flats (4)	4,000
John L. Smith, 1345 Knox av. N., 1½-story frame dwl.	2,000
T. B. Walker and W. J. Burton, 623-33 1st av. N., and 24-30 N. 7th st., enclosure for passenger elevators, Crown Iron Works Co., builders	2,550

*Chapman & Magney, Essex building, are completing plans for the motion picture theater which Saxe Bros. will build on 7th st., adjoining the Miles; 50x157, brick, steel, reinforced concrete; basement for mechanical equipment, concrete foundation, reinforced concrete floors and roof slabs; no balcony, seats for 1,000; ornamental front, steam heat, modern plumbing, tile and marble work, mechanical ventilation, air coolers, no stage, pipe organ, ornamental iron marquis; present wood building to be moved off at once; plans to be ready for figures after first of year.

Four new grade schools are in the program of the school board, for 1914. Efforts will be made to have them built at once; board also decided to build an addition to the Simmons, Minnehaha and 38th. Efforts will continue to have a large modern structure built for the East High. The new grade schools proposed are: Thomas Lowry, Lincoln and 29th av. NE.; Robert Fulton, Vincent and 49th S.; Clara Barton, Colfax and 43d S.; Jefferson, Emerson and 26th S.

President T. E. Hughes, of the Union City Mission, which has secured the old Pence Opera house site, states that the new building for the mission will be a hotel on the plan of the Mills hotels in New York; this includes division of long rooms with partitions of seven feet and spaces for bed, chair, stand and mirror; baths and showers on each floor.

*Albert Anderson will build a 4-flat at 2643 Elliott; architect, none; day labor; 26x40, 2-story, plaster veneer, hardwood floors and finish, hot water heat, plumbing, wiring; cost \$8,000. The same owner will build two other 4-flats, similar specifications, at 2647-2651, concrete block foundations; cost \$8,000 each; day labor, no architect.

*Henry W. Jones, architect, Plymouth building, has started plans for several churches; North Baptist Church, Lansing, Mich., \$10,000; First Baptist church, Lexington, Va., \$30,000; First Methodist at Watertown, S. D., \$60,000; Mr. Jones also

will prepare plans for a parsonage to cost \$15,000, for the Mt. Vernon, N. Y., Baptist church.

Permit for a brick apartment building of six flats was issued to John J. Courtney, 2d av. S. and 4th st.; plans by Alden & Harris, architects, Commerce building, St. Paul; general contract to John M. Hoy, Metropolitan block, St. Paul; 39x55, 3-story, entirely modern, steam heat, cost \$18,000; 1313-23 W. 25th st.

The month of November shows an increase of \$103,200 in building permits over the same month last year. The total is \$810,845, against \$707,645 in November, 1912. For the first eleven months of the present year, the total permits issued totalled \$11,699,145, against \$11,266,145 last year. This is a gain of \$433,000.

*Regarding an item in this column last week about plumbing, heating and mechanical equipment of the McKnight building, it is learned that H. Kelly & Co. installed all the plumbing and heating and mechanical equipment of the 4-story building, first erected; and the plumbing of the eight stories just added.

S. J. Bowler, architect, Boston block, is completing plans for a frame and stucco flat building at Clinton and 26th; owner's name withheld; eight apartments, 2-story, stone foundation, steam heat, hardwood floors, electric light and bell, laundry, tar and gravel roof, screened porches front and back; cost \$15,000.

*G. C. for H. J. Clark residence, Groveland Terrace, awarded to Nels Jensen; plans by Messrs. Carl Gage, Bertrand & Chamberlin; superstructure to cost about \$10,500; foundation in, by Anchor Stone Co., 50x72, brick, vapor heat, Denison tile, plate glass, leaded glass, completely modern.

Minneapolis, Fort William and Winnipeg capitalists are stated to be preparing to build a large terminal grain elevator at Coquitlan, Wash. Syndicate headed by R. J. Henderson, Fort William, formerly superintendent Grain Growers' Asso. Elevators, Fort William.

Jackson & Stone, architects, 643 Security building, report hot water heating contract, Edwin Dodge residence, Wayzata, let to Tibbetts & Wise, Wayzata; plumbing to Bjorkman Bros., 712 S. 10th, St. Paul; electric to Grosse-Langford Electric Co., 718 2d av. S.

C. A. Davis & Co., 247 Security building, who have the contract for the \$60,000 educational building, university of Minnesota, desire bids on 4-inch tile fireproofing, plate and sheet iron glass, timber, mill work, interior finish, metal lath and ceilings and plaster.

Belden Porter Gray Co., 704 S. 5th, are low bidders for heating, plumbing and wiring of the Minneapolis Athletic Club building; James Leck & Co., general contractors, 311 S. 7th., Bertrand & Chamberlin, architects, N. W. Bank building.

A factory will be built at 200 3d av. N. by the Sonorus Co., of Buffton, Ind., for the manufacture of piano players; arrangements conducted by Alexis Caswell, Civic and Commerce Association, with R. K. Settergren.

Pittsburgh Coal Co. has taken permit for coal bins, office building and shed at 2822 S. Emerson; coal bins, 76x216, frame; office building, 40x16, 1-story, concrete footing, modern equipment; cost \$15,500; day labor.

Jerdee & Hendrickson, 2936 30th av. S., were awarded contract for lighting fixtures, high school St. Louis Park, F. E. Halden, architect, Kasota block; also C. S. Moorehouse flats, 9th av. and 18th st.

*Frank J. McCrossen, 251 Greeley av., is building a duplex at 1130 Irving av. N., concrete block foundation, 26x44, hardwood trim, plumbing, gas, frame, \$2,500; M. T. Hollick, builder, 1023 Western av.

Hearing Dec. 15 on the proposed municipal harbor will be attended by Lieut. Col. Chas. L. Potter, United States engineer. City Engineer Capellen is preparing estimates for the sea wall.

*Permit was issued for the 4-flat at 1413 3d av. S., for Margaret McGrath; plans by Kirby T. Snyder, architect, Plymouth building, 34x40, 2-story, brick, modern, \$4,000, day labor.

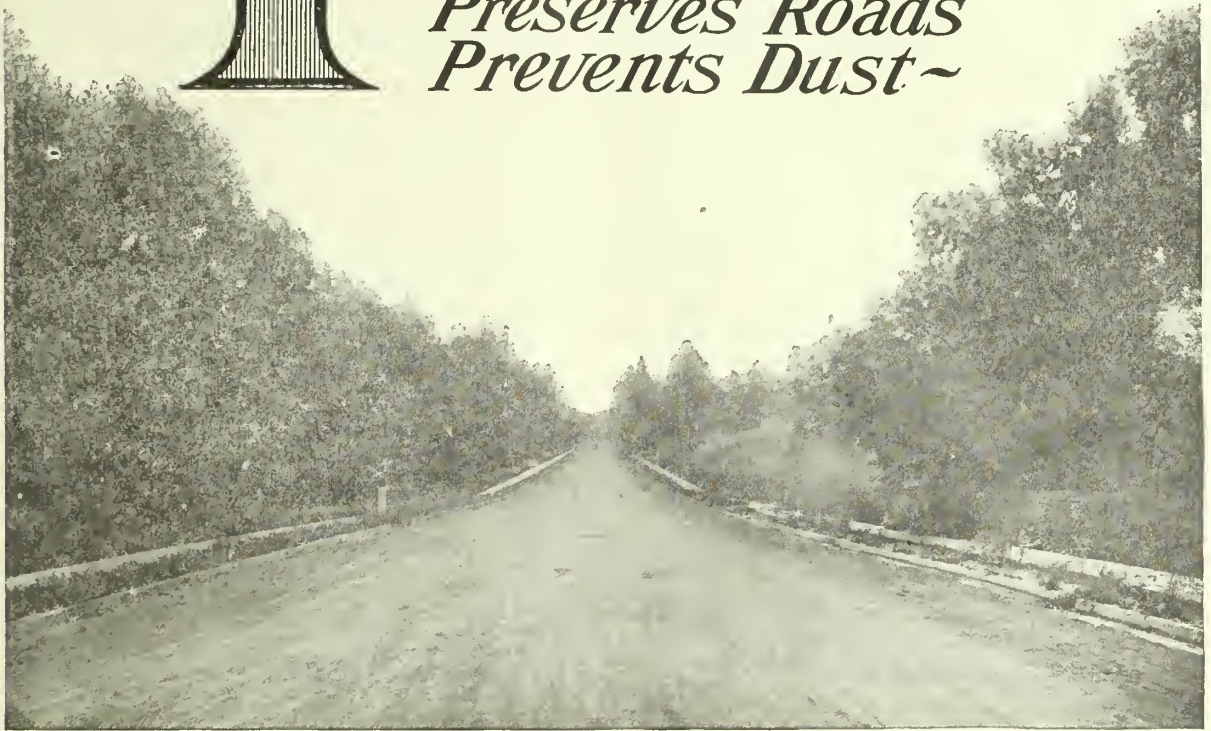
Plans by Harry W. Jones, architect, Lumber Exchange, for improvements at Lake Harriet pavilion, have been approved and bids will be taken, promenade and new grand stand, etc.

Premises at 242 1st av. S. will be remodeled for an ice cream cone factory, Standard Baking Co., owner; H. E. Biemer, Robert G. Cargill and Fred W. Pepper, officers.

Fires at Excelsior, Minn., Lake Minnetonka, destroyed the

Tarvia

*Preserves Roads
Prevents Dust~*



Observatory Road, Cincinnati Ohio. Constructed with "Tarvia X."

Cincinnati's Experience with Tarvia

CINCINNATI began building roads with Tarvia in 1907, when part of Madison Road, the main eastern thoroughfare from the city, was resurfaced with it.

The results were so satisfactory that the tarviated area was extended year by year, and the road has been in such good condition that it was selected for exhibition at the Road Makers' Convention in 1912. During these six years the maintenance cost had been trifling, consisting of slight repairs and partial treatments with "Tarvia B."

Erie Avenue, an extension of Madison Road, was resurfaced with "Tarvia X" in 1908. Before that it had required resurfacing every six months. After the Tarvia treatment no maintenance was re-

quired until 1912, when some repairs were made and a surface treatment of "Tarvia B" was given.

Grandin Road was tarviated in 1907 and since then has had one surface treatment with "Tarvia B" and other slight repairs.

Burnett Avenue was tarviated in 1908. Two years later it received a surface treatment of "Tarvia B" and is in first-class shape now.

Observatory Road was tarviated in 1909 and was not touched for repairs until 1912, when it received a surface treatment of "Tarvia B" at trifling expense.

All these are important and busy thoroughfares which had a serious maintenance problem before Tarvia was used.

Tarvia is made in three grades—"Tarvia X" is a dense, viscid coal tar product of great bonding power, suitable for building macadam roads; "Tarvia A" and "Tarvia B" are thinner grades suitable for roads already in use, to preserve them and make them dustless.

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THE PATERSON MFG. CO., Ltd.—Montreal Toronto Winnipeg Vancouver St. John, N. B. Halifax, N. S. Sydney, N. S.						



old bath house, which will be replaced with a concrete building; also destroyed the bungalow of Geo. Fitch.

Contract let to C. W. Lundquist Co., 1418 Adams, for the erection of factory for the American Sectional Furniture Co., 3-story, brick, 80x128, at 15th and Quincy.

J. E. Bostrom, 3817 10th av. S., is building a 1½-story frame dwelling, concrete block foundation, hardwood trim, plumbing, gas, 26x36, \$2,500, day labor.

W. H. Arrel, 514 16th av. N., has contract for the Minneapolis branch plant of the U. S. Register Co. at 2109-2111 Cedar av., 40x130, 2-story brick.

Haglin & Stahr Co., general contractors, 229 Lumber Exchange, have begun work on the Hubbard Milling Co. elevator, Mankato; cost \$15,000.

Work is expected to be resumed for completing the Chas. G. Gates mansion, Lake of the Isles blvd. Mrs. Gates having arrived in the city.

*O. B. Currier, 3416 Blaisdell av., is building a 2-story frame dwelling, 24x26, hardwood trim, plumbing, gas, \$2,000, at 3950 2d av. S.; day labor.

Stewart Memorial church, Stevens and 32d, raised \$5,180 to finish Sunday school addition, which will cost \$7,000.

Hineline & Co., 2115 5th, have contract for plumbing and heating, Albert Lee passenger station, Milwaukee road.

Twenty new class rooms are needed at the South High according to Principal Jorgens.

ST. PAUL, MINN.

404 Scandinavian American Bank Bldg. Phone: N.W. Cedar 1683.
Mail or telephone news not later than Wednesday.

BUILDING PERMITS.

S. Walsh, builder, Hatch st., 1½-story frame dwl., Hatch near Western	1,500
E. A. Wanzel, 1086 Rice st., 1-story frame dwl., Rose st. near Rice; E. A. Wanzel, builder.....	1,100
J. Sachowitz, 312 W. Central, 1½-story frame dwl., Lafond near Grotto; A. Leahswitzer, builder.....	1,400
Gertrude L. Upton, N. Y. Life building, 1½-story frame dwl., Princeton near Baldwin; John L. Wilson Co., builders	3,000
John L. Wilson, Germania Life building, 1½-story frame dwl., Marshall near Fry; F. X. Tewes, builder.....	3,000
John L. Wilson, Germania Life building, 1½-story frame dwl., Marshall near Fry; F. X. Tewes, builder.....	3,000
Chas. G. Hunt, Snelling and University, 1-story brick dwl., Breda near Snelling; E. C. Bruce, builder.....	2,500
Wm. Greig, 1548 Laurel, 1½-story frame dwl., Dayton near Snelling and Saratoga; A. H. and J. A. Rundquist, builders	2,950
Fred Roy, 119 Fenton, 1½-story frame dwl., Grand near Hamline; Fred Roy, builder.....	3,000
Davis & Lagerman, agents, repairs store account of Borg fire, 6th near Cedar; Romer Const. Co., builders.....	6,700
Ivan Breck, 163 Stevens st., 2-story frame dwl., Robie near Bellows; Ivan Breck, builder.....	1,800
E. Regnier, Hastings, 1½-story frame dwl., Rondo near Finn.; Wm. Christopherson, builder.....	3,500
Anna Brown, 305 Iglehart, 2-story frame dwl., Marshall near Fisk; Anna Brown, builder.....	4,000
H. L. Nelson, 730 Central av., 1-story frame dwl., Como road; H. L. Nelson, builder.....	1,000
H. W. Mahle, 449 Mt. Ida, 1½-story frame dwl., Lincoln near Pascal; G. A. Anderson, builder.....	3,500
Geo. Benz & Sons, Shubert building, alterations, corner Wabasha and Exchange; Romer Construction Co., builders	1,500
Geo. D. Taylor, 2343 Hampden, 2-story frame and stucco dwl., 931 Bayless, Geo. D. Taylor, builder.....	2,000
Olaf G. Nelson, 702 E. Lawson, 2-story frame dwl., Jessie near York, Olaf G. Nelson, builder.....	3,000
John Johnson, 626 Lawson, 2-story frame dwl., Geranium near Weide, John Johnson, builder.....	2,500
Edith Peterson, 617 Magnolia, 1½-story frame dwl. Blair near Albert, Chas. Peterson, builder.....	2,500
W. A. Tilden, 276 Sherburne, 1-story brick garage, Grand near St. Albans, M. Fenstad, builder.....	12,000
Mike Omeffy, 1404 Ashland, 1½-story frame dwl., Ashland near Albert, Mr. Haugan, builder.....	2,500
C. J. Richards, 1039 Kilbourn st., 1½-story frame dwl., Orchard near Kilburn, C. J. Richards, builder.....	1,000
Miss C. C. Gruber, 574 Selby, 1½-story frame and stucco dwl., Grand near Albert, M. Fenstad, builder.....	3,750
D. E. Lane, New York Life building, 1-story frame store and dwl., Hewitt near Hamline, E. Rydren, builder.....	2,500
Stanley Bojarski, builder, 613 Sherburne, 1-story frame dwl., Blair near Hamline.....	1,800
Annethe Farwell, 309 Wilder av., 1½-story frame dwl., Marshall near Griggs, John Florin, builder.....	3,600
Gerhard Sturre, 649 Como boulevard, 2-story frame dwl., Dayton near Hamline, Gerhard Sturre, builder.....	2,000
Walter Greenwood, 1519 Branstion, 1½-story frame dwl., Walter Greenwood, builder.....	2,500
August Kamoske, 331 Burgess, 1½-story frame dwl., Burgess near Farrington, August KaKmoskaa, builder.....	2,000
Patrick Roan, corner Adams, 2-story frame dwl., Union st. near Viletorla, Gust Kruger, builder.....	2,000

Purchase of the Berkey homestead adjoining the new Cathedral by the Roman Catholic diocese of St. Paul means that a large archbishop's residence will be built, according to persons in a position to know. The Berkey home was sold for \$35,000 and will be remodeled for the present to accommodate the pastor and priests of the Cathedral, who are expected to move in a few months on account of the leasing of the old cathedral property which is persistently re-

ported. A driveway will be built between the new cathedral and the end of the property line from Selby to Dayton avs. Cathedral has 180 feet on Selby and Dayton avs. by 235 feet from street to street.

The Rauch & Lang Electric Car Co. has closed a contract with Wm. A. Tilden, a St. Paul contractor, for the erection of their St. Paul branch at Grotto st. and Grand av. Work on the building is to start Dec. 1, and is to be ready for occupancy in about 90 days. The structure is to be 80x150, 1-story, with full basement and will give the company facilities for caring for fifty cars. It is to be built of tapestry brick and will be fireproof.

H. A. Miller, architect, Pittsburgh building, reports contract let for the foundation of the David Grossman 6-flat building, Holly between Kent & Dale, let to Austin & Atkinson, St. Paul; brick, 38x72, hardwood floors, steam or hot water heat, screen porches, 3-story, sideboard, beam ceiling, kitchen cabinets, wall beds, gas stove, umbrella racks on hall closet doors; architects taking figures on superstructure.

Annette Farwell, 309 Wilder, is building a residence on Marshall between Griggs and Syndicate; 1½-story frame 26x34, concrete foundation, hardwood floors and finish, hot water heat, laundry trays, fire place, modern plumbing, sleeping porch, bookcases, sideboard, electric light, gas, leaded glass, tile bath; cost \$3,600; John Florin, builder, 1279 W. Minnehaha.

Alden & Harris, architects, Commerce building, have let contract for the electric garage for the Morgan-Foster Co., Grand and Grotto, to Morton Fenstad, 1872 Laurel; heating, plumbing and electric work to be let later by the architects; work started; brick, stone foundation, reinforced concrete, plate glass fronts, wash rack, steel trusses, composition roof.

The Commercial garage at Concord and Robie st., architect A. L. Garlough, Rosen building, is under roof; general contractor, Nick Westley, 131 Concord st., brick; steam heating let to C. F. Hochmuth, 135 Concord st. Electric work to Electric Construction Co., 181 E. 4th st. Charles Christian, owner, Security State Bank, Concord and Winnifred.

Morton Fenstad, 1872 Laurel has a contract for a residence on Grand near Hamline, for Miss C. C. Gruber, 514 Selby; 1½-story, frame, stucco, concrete foundation, 26x30, hardwood throughout, hot water heat, fire place, sleeping porch, book cases, side board, tile bath, leaded glass, laundry trays, bath cabinet, electric light, gas; cost \$3,750.

Grand Forks court house heating, plumbing and ventilating contract was let to Spriggs Bros., St. Paul, at \$12,223; electric wiring, to E. A. Braseth, Grand Forks; vault doors, Victor Safe & Lock Co., St. Louis, iron shutters included; furniture contract not let; Buechner & Orth, architects, Shubert building, St. Paul.

H. W. Mahle, 449 Mt. Ida, is building a 1½-story frame dwelling, 24x27, concrete foundation, hardwood throughout, plumbing, wiring, hot water heat, tile bath, laundry trays, fireplace, sleeping porch, leaded glass on Lincoln, between Pascal and Saratoga; G. A. Anderson, 1637 W. Minnehaha, builder.

S. V. Ballou, 503 Pioneer building the St. Paul manager for Oscar F. Symons & Co., reports that the contract for metal weather strips for the new Gordon-Ferguson building has been awarded to that company for the Monarch strip. The work of installation has already begun.

Permit was issued for the 2-story frame dwelling being built by Phillip G. Hoffman, 711 N. Y. Life, on Fuller between Dale and St. Albans, 26x35, hot water heat, fireplace, plumbing, wiring, gas, sleeping porch, sun-room, tiling, book cases, sideboard, beam ceiling; cost \$4,000.

Bids for the general contract of the Merchants National Bank building will be in Dec. 9. There is great interest in this letting as it will be one of the largest office buildings in the northwest, and has brought proposals it is said, from the largest Chicago contractors.

Olaf G. Nelson, 702 E. Lawson, is building a dwelling on Jesse, between York and Case, 2-story frame, concrete foundation, 26x45, hardwood throughout, hot water heat, mantel, sleeping porch, laundry tray, modern plumbing, electric light, gas; cost \$3,000.

H. A. Miller, architect, Pittsburgh building, is preparing plans for a duplex at 14th and Jackson, for B. Winnick; frame, concrete foundation, hot water heat, plumbing, wiring, laundry trays, front and rear porches, hardwood finish.

D. E. Lane, N. Y. Life, is building a 1-story frame store and dwelling on Hewitt and Hamline, 24x48, concrete foundation, plate glass front, hardwood floor, flat roof, gas; cost \$2,500; Edwin Rydeen, contractor, 815 University.

*Bids received by state board of control until 2 p. m., Dec. 17, for telephone system, watchman clock system and electrical construction, power plant, state asylum, Rochester, Minn.; see official advertisements in The Bulletin this week.

Work on excavating for Italian Catholic church, Smith av. near Chestnut, will begin before the first of the year; brick,

Barrett Specification Roofs

No Maintenance Cost

AN investigation into net roofing costs will promptly disclose the superiority of Barrett Specification Roofs. Their first cost is lower than that of any other permanent roof, and, as they require no painting or other care for upwards of twenty years, their maintenance cost is nil.

The Bush Terminal Company, with a total roof area of more than 70 acres (3,100,000 square feet) on their 181 buildings in Brooklyn, illustrated below, studied the subject of roofing costs and adopted this type of roofs. The Vice-President of the Bush Terminal Company writes:

We use this kind of roofing because our experience has shown it to be the best and cheap-

est. Our analysis of first cost of application and cost of maintenance entitles us to speak with some measure of authority.

The roofing contractor states that the expense for maintenance of this entire roof area has been less than \$10 and estimates that if metal or ready-made roofings had been used it would have been impossible to keep the buildings free from leaks, and that the painting bill alone up to date would probably have amounted to at least \$50,000.

It is on such evidence as this that we base the statement that the maintenance cost of Barrett Specification Roofs is *nothing per year*—and the \$10 exception “proves the rule.”

A copy of The Barrett Specification free on request. Address our nearest office.

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represent a distinct advance in chimney design and construction, utilizing not only the full compressive strength of the concrete shell, but also the full tensile strength of the embedded steel, according to well known laws of design. They are stable, permanent and of good appearance.

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makes dependable, enduring concrete when properly mixed with other good materials. It should be specified not only for concrete chimneys, but for every form of building where concrete is used.

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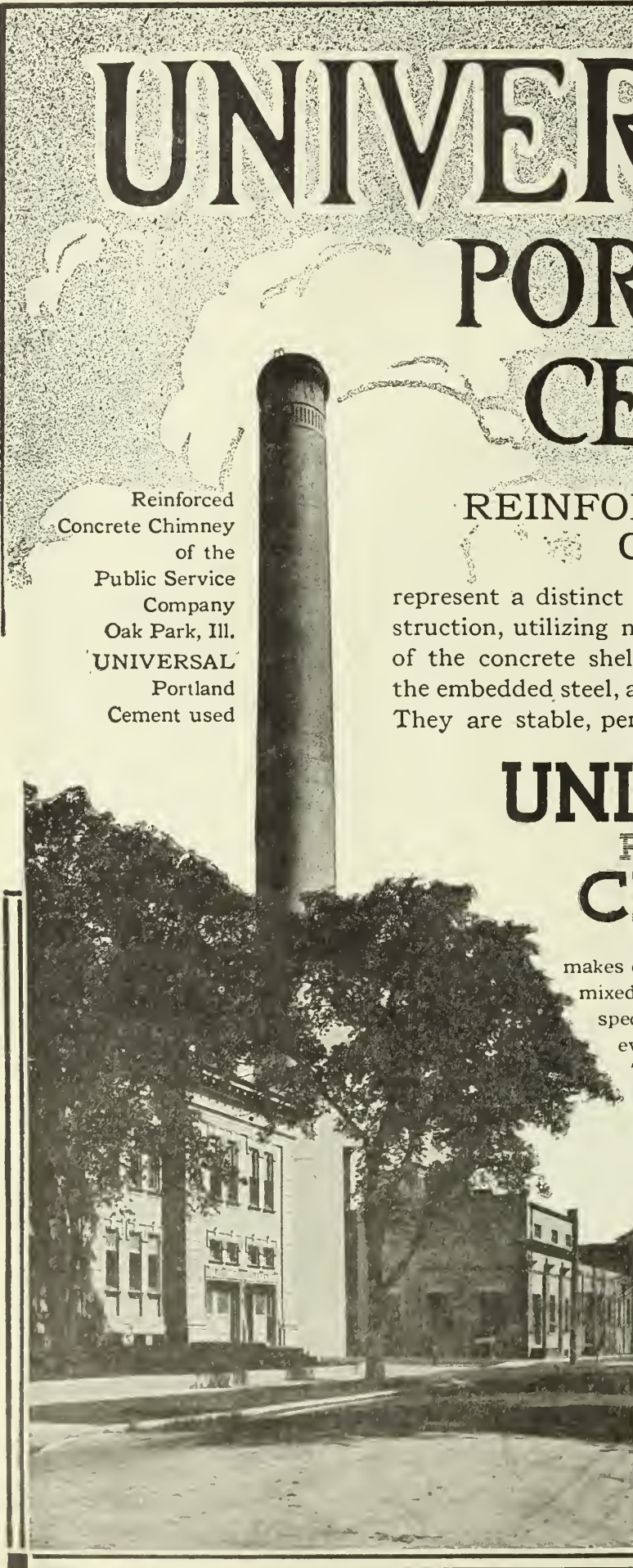
**UNIVERSAL
PORTLAND CEMENT CO.**



OFFICES:

Chicago - - 72 West Adams Street
Pittsburgh - - - - Frick Building
Minneapolis - Security Bank Building

Plants at Chicago and Pittsburgh
Annual Output 12,000,000 Barrels



seats for 500; plans by E. L. Masqueray, architect, Endicott building; Rev. O. R. Balducci, pastor, 222 N. Smith.

F. J. Romer Construction Co., 190 Ramsey, have the contract for improvements in the bottling house of the Hamm Brewing Co., Minnehaha and Green Briar; cost \$5,000.

Buechner & Orth, architects, Shubert building, will have plans out after the first of the year for the new poor farm buildings.

Stanley Bozarski, 613 Sherburne, is building a 1-story frame dwelling, 26x28, hardwood trim, plumbing, gas, on Blair near Hamline.

John Johnson, 626 Lawson, is building a 2-story, frame dwelling on Geranium near Werde, 24x26, hardwood trim, plumbing, gas; cost \$2,000.

WATER WORKS

Notes Arranged Alphabetically by States.

Iowa, Anita—Henry Kneer of Emmetsburg, Iowa, has been engaged to superintend the construction of water works extensions.

Iowa, Anita—A pump house will be erected; cost \$2,000.

Minn., Wadena—A new pump must be purchased for the city well, council will also secure estimates on cost of a reservoir for the water system; write Superintendent Hughes.

Iowa, Carson—City has voted bonds for a water works system.

Minn., Waseca—W. L. Thorne Co., of Platteville, Wis., have begun work on the new 12-inch well for the city.

Neb., Blair—Improvements and extensions to the water works system are planned to cost \$15,000.

Neb., Burning—It was voted to install water works.

Neb., Morrill—Water works bonds were voted.

Neb., Norfolk—Council will reactivate for bids for water works extensions bonds, \$34,000, which were rejected by H. T. Holz & Co. of Chicago.

Neb., Ord—Engineer Standeven, Omaha, recommends the sinking of a 12-inch well for the city.

Neb., Waverly—Improvements will be made to the water works system, another well will be dug.

Wis., Altoona—Council has taken steps to build a municipal water system, one proposition calls for connection by pipe line with Eau Claire water works.

CONTRACTS AWARDED.

Mont., Glasgow—Contractor Geo. W. Kemper, Minot, N. D. will begin work this week on extensions of city water works.

Neb., Bayard—A vote will soon be taken on a water works system to cost \$15,000.

Neb., Beatrice—Council awarded contracts for construction of the water works extension from Zimmerman Springs to this city to the U. S. Cast Iron Co., The American Well Works Co., The B. R. Electric Co. and the Interurban Construction Co.

Neb., Silver Creek—Contract for water works let to Alamo Engine & Supply Co., Omaha.

Wis., Ladysmith—Work has started by contractor. J. T. Johnson on foundation for the steel water tower.

MILWAUKEE, WIS.

Office: Hathaway Building. Telephone: Main 1827.

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

Carl Winter, Louis av. between Center and Hadley st., flat.	1,900
City of Milwaukee (board of school directors) school building	100,000
Mrs. Steinmueller, Scott st. between 30th and Grand av., flat	4,200
A. Pauling, Grand av. between 21st and 22d, rear, garage.	7,000
City of Milwaukee (public library board), 8th and Grand av., addition	50,000
Ticonic Investment Co., northeast corner Jackson and Huron, manufacturing building	65,000
Board of School Directors (city of Milwaukee), Washington high school	400,000
Fischers Bros., Hopkins near 22d, flat	3,500
Mary Duhus, 38th st. near Clarke, flat	4,000
James Velefeld, 23d av. near Beech st., cottage	2,500
Grove Land Co., American av. near Cleveland, flat	2,500
A. R. Schacht, N. W. corner 6th and Mitchell, addition	3,000
Miss Elizabeth Connelly, Sycamore near 24th, flat	3,600
Wm. Wirthwein, Burleigh near 24th st., flat	3,500
Joseph Holehouse, 23d av. near National av., bungalow	3,700
John Goldenbeiski, 1356 3d av., cottage	2,200
Frank Stanek, 1086 19th, flat	3,700
Philip Koehring, Wright st. and Sherman boul., church	2,700
M. Kant, Richards near Clarke and Center, cottage	2,000
J. W. Dorsey, 78 Farwell av., two stores and hall	30,000
The Savings Investment Co., Bartlett and Kenwood boul., dwl.	4,000
A. J. Lindeman & Hoverson Co., 1st and Cleveland av.,	

Joseph Hansu, 29th st., flat	4,500
J. S. Miller, Island av. near Center st., bungalow	4,000
Harry Detzek, 699 Hanover st., addition	3,000
Ernest Pretschold, N. E. corner 15th and Walnut st., store and three flats	8,000
Mrs. C. Hartfield, 54th near N., flat	4,000
A. Rausch, N. E. corner 34th and Clarke st., flat	2,600
John B. Weber, 23d and Arthur av., flat	6,000
Chas. Draves, S. W. corner 29th and Burleigh st., store and two flats	4,800
Theo. Richter, 29th near Locust, flat	4,200
Crist Lind, 22d and Townsend, cottage	2,000
Jos. Gusch, N. W. corner 37th and Wright st., flat	6,000
Dr. Healy, 850 Wentworth av., bungalow	3,300
Louis Auer & Son, 41st and Meinecke av., flat	6,000
Jacob Kleis, 488 19th av., flat	4,000
May Korthals, 943 Muskego av., flat	4,000
John Hausen, 30th av., flat	4,200
Frank Ranchfus, Aldrich near S. Bay, cottage	1,800
Ed. Berlau, Burrell and Montana, flat	3,000
Frank Barabowski, 882 14th st., flat	3,800
Joseph B. Hauser, 24th av. near Rogers, flat	4,100
Penner & Angel, 682 Oakland av., addition	4,000
P. Wagenknecht, Hopkins near 23d st., flat	3,900
Mrs. Rasser, 641 29th st., flat	3,600
James Chacona, SW. corner 8th and Grand av., alterations	1,500
The Westminster church, Farwell and Bellevue av., addition and alterations	12,000
Otto Hackbarth, Meincke av. between 17th and 18th sts., flat	5,000
Evangelical Lutheran Advent Congregation, NE. corner Island, church	1,800
Carl Winter, Louis between Center and Hadley, flat	3,000
Geo. C. Burnham, northwest corner of Ferry and S. Water, alterations	10,000
Milwaukee Western Malt Co., S. Water and Division, addition	2,500
V. Montivid & Son, 561 E. Water, addition	14,000
Fred Korth, Galena near 34th, flat	3,500
R. P. Hanson, Orchard Place near Mann, northeast corner Frederick and Linwood, flat	6,500
Joseph Mann, northeast corner Frederick and Linwood, flat	6,500
Otto J. Steurwald, 51st between Pabst and Elm, flat	4,500
Edward F. Martin, 51st between Pabst and Elm, dwl.	4,000

The Badger Architects, 916 Walnut st., a recent architectural firm composed of Geo. Zagel and P. J. Matt, have awarded contracts for a large 3-story apartment building for David J. Borun, 552 E. Water st.; carpenter, R. Malnakoff & Co.; mason and concrete, Lex Bros.; plaster Belfer & Miller; tile, Wisconsin Mantle & Tile Co.; sheet metal, Consol Sheet Metal Works; iron work, Skobis Co.; plumbing, David Stern; heating, Zuehlke Heating Co.; electrical work, J. Kennen; roofing, South Side Roofing Co.; painting, Friedlander & Sietzman; glass, T. C. Essar Co.; vacuum cleaning system, Challenge Vacuum Cleaning Co.; hardware, Ph. Gross Hardware Co.; vaults and safes, Pritzlaff Hardware Co.; cut stone, The Tingley Co.; lumber, Carl Mueller Lumber Co.; interior finish, West Side Manufacturing Co.; electrical and gas fixtures, H. E. Franke; cost \$55,100.

The building committee of the board of school directors recommended the acceptance of the bid of Edward R. Kieslich for doing the reinforced concrete and other work required for the footings, foundation, basement, boiler-house, fuel room, terrace, floor of ground floor story, auditorium floor, stage floor, etc., for the new \$400,000 Washington high school building, Sherman blvd., between Wright and Clarke sts., for \$55,345. The bid for the plumbing, including sewer and temporary water supply, submitted by William Esser, at \$840, was approved. The contract for erecting school barracks on 13th av., near Lincoln av., was recommended to be given to Charles Guetzkow at \$2,234.

The Badger Architects, 916 Walnut st., have awarded the general contract for the construction of a 1-story, brick store building to 34 33d av., for Mox Woldorf, to B. Mendelson, 640 10th st. It will be 30x26 feet and cost \$2,300. General contract includes all work except carpenter. The same architects will take bids on the iron and copper set system in plate glass to be used on a remodeling contract of a building at Reed and Virginia sts.; also for the remodeling of a store building on Fond du Lac av., for Goodsit & Rosenthal, estimated at \$1,500.

Architects Brust, Philip & Heimerl, 82 Wisconsin st., have awarded contracts for the construction of the new Ed. Schuster & Co., department store building, 6th av. and Mitchell st.; to be 110x159, of reinforced concrete and fireproof construction, 4-story; costing \$250,000. J. W. Utley, has carpenter, mason, concrete and cement; S. D. Bauman, plaster. Consolidated Sheet Metal Works, sheet metal.

Architects Gray-Clark Co. have completed plans for a brick, steel and reinforced concrete bakery building to be erected for Albert Heath, Wells and 21st sts. The structure will be modern in every respect, fireproof, sanitary and a model bakery, white-faced enamel brick finish will be provided throughout and the equipment will be of latest design. To be 130x60; bids will be asked for in a few days.

Architects Van Ryn & De Gelleke, Caswell block, have awarded the foundation contracts for two new normal school buildings which will be erected in the state. One will be at Eau Claire, contract to Hoepfner & Bartlett, costing \$250,000; the other is to be erected at River Falls at a cost of \$110,000, foundation to R. W. Hartman, Milwaukee. Work on the superstructure will not be started until spring.

PROPOSAL ADVERTISING FOR BIDS

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OFFICIAL ADVERTISEMENTS for pro-
posals will be published in this depart-
ment on receipt of copy with order from
authorized official, building committee,
architect or engineer.

RATE FOR NOTICES in this depart-
ment—15c per line each insertion. No dis-
counts allowed. Several insertions are cus-
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used this medium that by investing a few
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COPY RECEIVED up to Friday, 10 a. m.,
will be published in the paper, delivered to
subscribers on Saturday, but should reach
the publication office, Lumber Exchange,
Minneapolis, earlier in the week, when pos-
sible.

LATE NOTICES Friday morning can be
transmitted by long distance telephone.

NOTICE TO BIDDERS.

Sealed bids will be received by the
Board of Education at Foley, Minnesota,
until 2:00 P. M., Friday, December 19th,
1913, for the erection of a two-story,
brick addition to the present high
school building.

Plans and specifications can be seen
at the Builders' Exchange, in both
Minneapolis and St. Paul, Minnesota,
and the same may be obtained from the
Architect, Rolland C. Buckley, St. Cloud,
Minnesota, upon payment of ten dollars
(\$10.00.) This amount to be refunded
when the plans are returned.

Separate bids will be received on the
following:

- (A) General Construction,
- (B) Heating and Ventilating,
- (C) Plumbing.

Each bid must be accompanied by a
certified check of 5 per cent of the
amount of bid. All checks to be made
payable to Mr. C. F. Callahan, Secre-
tary of the Board of Education of Foley,
Minnesota.

The Board reserves the right to re-
ject any and all bids.

Bids to be opened at 2:00 P. M. on
Friday, December 19th, 1913. Dated
November 19th, 1913.

MR. C. F. CALLAHAN,
Secretary of the Board,
of Education,
Foley, Minnesota.

(Continued on Page 24.)

PROFESSIONAL DIRECTORY

ENGINEERS

OSCAR CLAUSSEN ENGINEERING COMPANY

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312-16 Commercial Bldg., St. Paul, Minn.

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MINNEAPOLIS.

NORTHWESTERN MANAGERS

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Architect Chas. J. Keller, Germania building, has awarded the following contracts for construction of a duplex flat building, for Mrs. Hulda Meyer, 580 Layton blvd., frame and shingle, brick and concrete foundation, 26x54, 2-story; concrete and cement, Henry Schrier; plumbing, Walter Kleinfeldt; heating and ventilating, M. L. Hahn; electrical work, A. R. Merton; painting, P. O. Olsen; cost \$6,000.

Architect Edward Koziak, Alhambra building, has plans prepared for construction of a reinforced concrete and brick garage for the Jos. Schlitz Brewing Co., for erection on the northeast corner of 4th and Galena sts. It will be 110x150 feet, of latest fireproof construction and provided with finest equipment to care for the brewery's new motor truck system.

Architect John Menge, Jr., Matthews building, has awarded the contracts for constructing a solid brick store building for A. R. Schacht at 6th av. and Mitchell st., mason, Lex Brothers; plaster, Herman Tews; plumbing, Alvin Martin; painting, Chas. Kohne; electrical work, Koch & Co.; iron work, Skobis & Co.; carpenter, Wm. Dorchon.

Architects Van Ryn & De Gelleke, Caswell block, who are designing plans and specifications for the various construction enterprises for the board of school directors, will be ready shortly for bids on the construction of the \$100,000, 2-story, 174x85, brick, Grant st. and a \$30,000 addition to the Auer av. school.

The Badger Architects, 916 Walnut st., have awarded the general contract for construction of a 4-family flat at 10th and Vine sts. to Meyer & Wachofsky, who will take bids on all but carpenter work; to be of brick veneer construction. Locher & Schiffren, Hanover and Virginia sts., owners; cost \$9,000.

Architect A. C. Eschweiler, Goldsmith building, has awarded the contract for the steel work on the nw Plymouth Congregational church, Summit, Hackett and Concord avs., to Jos. Skobis & Co. The structure will be about 85x120, with Sunday school rooms and guild hall provisions; cost \$75,000.

Architects Siebert & Broecker, 12th and Walnut sts., are taking bids for the construction of a residence for William Black, to be of brick veneer construction, 27x52, with maple floors, oak finish and mill-run finish, asbestos shingle, hot water heating, art glass, patent brick and tile; cost \$7,000.

Architect L. M. Gurda, 920 2d av. has completed plans and specifications for a store building. The owner is Felix Skupski, 549 Mitchell st., who will take bids and superintend the work of construction. It will be 40x82, 1-story with foundation to carry an additional story; cost \$10,000.

The Badger Architects, 916 Walnut st., have awarded the general contract for remodeling a duplex for Jack Schiffner at 768 14th st., into a four apartment building to L. Gagler, 1012 Galena st. It will be frame and 68x26; general contractor will take bids on all but carpenter work.

Architects Martin Tullgren & Sons, 133 2d st., opened bids this week for the construction of a 2-story brick building to be erected at 593 Downer av. It will contain two stores on the ground floor and a photographer's studio on the second floor. Arthur Strauss is owner. Cost \$12,000.

Architect Fred Maettig, 3208 North av., has awarded the general contract for the construction of a building for Frank Stanek, at 3221 Chestnut st., to Wm. Hoffman, who will take bids for all except carpenter work. It will be 2-story, of frame construction, costing \$4,000.

The A. J. Lindemann & Hoverson Co., 1st and Cleveland avs., is planning to erect a reinforced concrete addition to its warehouse. Klug & Smith, consulting engineers, are in charge. The capacity will be 438,600 cubic feet and the cost \$30,000.

Contracts awarded for the construction of a duplex flat at 25th and Sycamore sts., for Miss Elizabeth Connolly, wood and block construction, are: general contract, Henry Dorn; mason work, L. Frahm Co., 29th av. and Mitchell st.; cost \$4,000.

The Badger Architects, 916 Walnut st., have prepared plans for a bungalow to be erected at Richards and Center sts. F. A. Kant, 193 Garfield av., is taking bids for the structure, which will be of frame and brick veneer, 20x35, and cost \$4,500.

Architect Stanley F. Kadow, 988 Kinnickinnic av., has opened bids for the erection of a 2-story duplex flat building for Peter Meisenheimer, 133 Stewart st., on 24th av. It will be solid brick, 29x58, and cost \$7,000; contracts about to be

The Stillman-Paine Co., 130 Reservoir av., has the contract for art plastering of the new First National Bank building at Appleton, Wis. The same concern has a similar contract in the government building at Waukegan, Ill.

Architect F. W. Andree, Cawker building, has awarded contracts in connection with construction of a residence for August Richter, Jr., at Sherman blvd. and Irving place; heating, Thompson & Harriman; plaster, Kath & Son.

The Worden-Allen Co., local structural contractors, has a contract for constructing two large steel shaft houses at the Garner and Mackinac mines of the Cleveland Cliffs Iron Co., in the Swanzy district of the Marquette range.

Architect H. C. Hense, Caswell block, has completed plans and specifications for a new theater structure, bids on which will be called for shortly. The name of the owners and the location have not been announced.

W. H. Shenners Co. has awarded general contracts for the erection of residence buildings. Four houses to Fred Giese, five houses to Frahm & Buemming and one duplex flat to the Madison Co.

Architect Richard E. Oberts, 353 National av., will close bids this week for the construction of a frame stable for George Sheriffs at National and 36th avs. To be 36x48 and cost \$1,800.

William Yontz will erect a warehouse in spring, of brick and mill construction, to cost \$10,000. Plans are being drawn by Architect Keller, Germania building.

Architect Clare C. Hosmer, Wells building, has plans prepared for Forest D. Caloway, of Neilsville, Wis., to be frame and plaster. The owner will take bids.

Discher Bros., contractors, are erecting a new duplex flat building, frame and cement block, at Locust and 22d sts, which will cost \$3,500.

Mrs. Rasser, 641 29th st., will erect a duplex flat and has awarded the general contract to George Meyer, 1117 27th st.; to be 21x51.

Jos. Skobis & Co. have been awarded the general contract for the construction of a power plant at Hiles, Wis.

Charles Draves will erect a store and flat building at 29th and Burleigh sts., to cost \$4,800.

Joseph Holehouse will erect a bungalow at 23d av. and Scott st., to cost \$3,700.

DES MOINES, IOWA

Bert N. Mills, Representative, 310 Hubbell Building.

Des Moines city officials are discussing the plans for some method to secure the enforcement of the city ordinance which requires that plans for new structures shall be submitted to the city engineers before the buildings are begun. Recently many buildings have been started without securing permits from the city and they are now many buildings in course of construction in the city of which the city has no record. City officials are very anxious to have their records complete and they have already ordered the listing of new buildings for which no permits have been secured.

The plans being considered by the Des Moines city council for two large concrete bridges, to cross the Des Moines river at Grand av. and replace the steel structure now in use at that crossing. The other is to cross the Raccoon river, probably at 7th st. and serve the traffic now handled over the 1st st. bridge which soon will be out of commission because of the flood protection work which straightens the Raccoon river channel at that point.

The Des Moines Trades and Labor Assembly, a body representing the various union labor organizations of the city, has delegated a committee to choose a site for a new labor temple which is to be built here next year. The lease of the labor unions on their present headquarters soon will expire and the owner does not plan to extend the lease. He expects to remodel the building for use as a European plan hotel.

Atlantic reports plans on foot to rebuild the big plant of the Atlantic Canning Co., which was destroyed by fire a few days ago, with a loss of \$125,000. The factory was one of the largest of its kind in the world and over 25,000 cases of canned corn, owned by jobbers, was burned. Los Angeles and Omaha firms were the heaviest losers in that respect.

The Des Moines school board expects within a short time to advertise for bids on an addition to North high school which will cost \$150,000. Plans and specifications have been prepared by Proudfoot & Bird, the school board architects. There has been some trouble in securing the ground adjacent to North high.

Col. E. R. Moore, former member of the Iowa legislature and leading Cedar Rapids banker, was in Des Moines this week with his partner, Mr. Anderson. They conferred with J. C. Mardis, local contractor, regarding plans for a 10-story bank and office building which they will build in Cedar Rapids.

The Phillips, O'Malley & Tiernan Furniture Co., of Perry, announces that it will build a new 4-story business block on a fifty-foot lot just purchased in the downtown section. Excavation is to begin this year. The entire structure is to be occupied by the building company.

The Blackhawk Hotel Co. of Davenport has filed its articles of incorporation. It is capitalized at half a million dollars and its business will be to build and conduct a hotel in Davenport that will be the largest in Iowa. Plans are prepared and bids will be asked in a few weeks.

Plans are complete for a new 12-story building to be erected here by the Register and Leader, a daily morning newspaper. It will be located on ground between 7th and 8th sts on Locust

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MINNEAPOLIS, MINN

PROPOSAL ADVERTISING FOR BIDS.

PROPOSALS FOR BRICK SCHOOL HOUSE. Department of the Interior, Office of Indian Affairs, Washington, D. C., November 1, 1913. Sealed proposals, plainly marked on the outside of the sealed envelope: "Proposals for Rebuilding Brick School House at the Rosebud Indian School, South Dakota," and addressed to the "Commissioner of Indian Affairs, Washington, D. C.," will be received at the Indian Office until 2 o'clock p. m., of December 17, 1913, for furnishing materials and labor for rebuilding brick school house at the Rosebud Indian School, South Dakota, in strict accordance with the plans, specifications and instructions to bidders, which may be examined at this office, the United States Indian Warehouses at Chicago, Ill.; St. Louis, Mo.; and Omaha, Neb.; the Builders' Exchange, St. Paul, Minn., and at the School. For further information apply to the Superintendent of the Rosebud Indian School, Rosebud, South Dakota. CATO SELLS, Commissioner.

NOTICE TO BIDDERS.

Notice is hereby given, that sealed proposals will be received at the office of the County Auditor of St. Louis County, Minnesota, until 2 o'clock, in

the afternoon of Friday, Dec. 12, 1913, for the construction of State Rural Highway Number Four (4), established by an order of the County Board of the County of St. Louis, Minnesota, made and filed on the 27th day of September, 1913. The contract will be let to the lowest responsible bidder or bidders.

That the approximate amount of the work of construction of said State Rural Highway Number 4 is as follows: Furnishing and erecting in place all necessary culverts, and the construction of approximately thirty-two (32) miles of highway, of which about one-half ($\frac{1}{2}$) is through swamp, and one-half ($\frac{1}{2}$) on upland. That the estimated cost of said work, exclusive of engineering expenses, is One Hundred Twelve Thousand Five Hundred Dollars (\$112,500.00). That the said work is located between the point of intersection of the Culver road and the Miller Trunk Road, as its eastern terminus, and the westerly limits of St. Louis County as its westerly terminus.

The contracts for building the bridges on said road have already been let.

Proposals will be received on one or more sections or schedules of said work, or any one or more of such construction jobs, or for the entire work as one job. Each proposal must be accompanied by a certified check, made payable to the County Auditor of St. Louis County, Minnesota, for not less than ten per cent (10 per cent) of the amount of any bid, as a guarantee that

the bidder will, if successful, promptly execute a satisfactory contract and furnish satisfactory bond for the faithful performance of the work, as required by the drawings and specifications for said work. Bidders submitting bids on different sections of said work will not be required to furnish separate check with each proposal, but one check for ten per cent (10 per cent) of the aggregate amount of bids submitted will be sufficient.

Only experienced and responsible bidders will be considered in awarding the contract, and evidence of such experience and responsibility will be required. The County Auditor reserves the right to reject any and all bids.

Proposals must be marked "Proposal for Constructing State Rural Highway Number 4 in St. Louis County, Minnesota," and addressed to "O. Halden, County Auditor, Duluth, Minnesota."

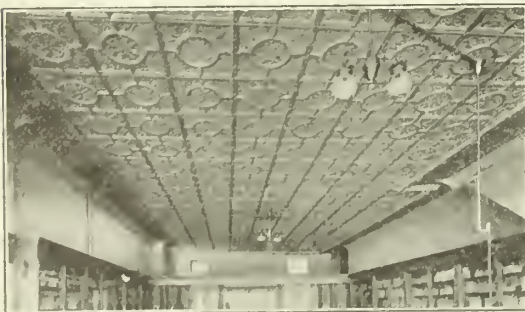
All proposals must be based upon the specifications for said work, which are part of the Engineer's Report in said proceedings and on file in the office of said County Auditor at the City of Duluth. For further particulars, address the undersigned County Auditor or E. K. Coe, Engineer in Charge, Court House, Duluth, Minnesota.

Dated Nov. 17, 1913.

O. HALDEN,
County Auditor, St. Louis County,
Minn.

By J. O. WALKER,
(Seal) Deputy.

(Continued on page 26.)



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and Ornament Co.**
ST. PAUL, MINN.

which the Register and Leader holds on a 9-year lease. Proudfoot & Bird, architects.

Citizens of Albia, county seat of Monroe county,, soon will be called upon to vote on the question of building a municipal lighting plant. The city council is favorable to municipal ownership and has decided to submit the question to a vote of the people.

Sawyer & Watrous are working on plans for a city morgue to be erected at 6th av. and Center st. by L. Harbach & Sons. It is to cost \$60,000 and will be a handsome structure of the Grecian style of architecture.

Permit issued to A. J. Coon for a 1-story frame residence, 25x36, 5-rooms, at 655 37th st., at \$1,900; Ada L. Hesbacher will build a 1-story residence, frame, 40x26, at 1009 Virginia st.; cost \$1,950.

Permission was granted to Rev. J. R. Zook to construct a parsonage for the Holiness church; cost \$3,700.

HEAD OF THE LAKES

Office: 206 Manhattan Building. Telephone: Auto 3036.

Mail or telephone news not later than Wednesday.

DULUTH.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

Zenith Box & Lumber Co., frame factory, Traverse st. near 44th	1,000
Nels O. Johnson, frame dwl., Tacony st. between 59th and 57th av. W.	1,400
Dr. J. W. Davis, frame dwl., London Road between 19th and 29th	3,000
J. Olson, two frame dwls., W. 5th st. between 42d and 45th av.	3,000
L. Ramstad, addition to brick garage, W. 1st st. between 4th and 5th av.	1,150
McKay Bros., repairs, 5th av. W. and 1st st.	1,000
M. J. Olson, frame dwl., 56th av. W. between Cody and Elinor st.	2,500
J. Gallop, remodeling, E. 7th st., between 5th and 6th av.	1,500
John H. Miller, remodeling frame dwl., Magellan st.	2,000
J. E. Erickson, frame dwl., 23d av. W. between 8th and 9th	3,000

A silo constructed out of cedar blocks and cement has been built by P. A. Paulson of RFD No. 1, and is an object of interest among the dairy farmers of that vicinity. About 3,000 cedar blocks, cut from timber on the Paulson farm, are used in the construction. The blocks are set in mortar and both the inside and outside of the silo have been plastered with cement. The inside dimension are ten by twenty feet and the capacity is twenty tons.

Architects are reported busy on plans for various business blocks to be built on Superior st. in the near future.

One of the largest recent permits issued was for \$9,000, covering the cost of a brick and stone foundation for a new church to be erected by the Trinity Evangelical Lutheran congregation on 3d st., between 27th and 28th avs. W. The structure is to be of brick and stone and will cost approximately \$25,000.

Plans are being prepared by F. G. German, architect, for a residence for Bernard Silberstein at the corner of 21st av. E. and 1st st.

Another permit for \$9,000 was issued to Guy E. Diehl to cover the erection of a tile dwelling on the Vermillion road.

The West Duluth Commercial club has gone on record in opposition to the proposed bond issue for the purchase of an armory site, alleging that taxes are already high enough.

SUPERIOR.

According to D. R. Long, a first class hotel is needed in Superior and he argues in favor of an organization of local capital to erect a hotel of the right sort on some site near Broadway.

SIoux CITY, IOWA

Sioux City Office: 310 Iowa Building; R. V. Sager, Representative.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

Thos. Hald, frame dwl., North Riverside	2,600
Martin Nelson, frame dwl., Hornick's Third addition	2,500
Ralph E. Ruggles, frame dwl., Metropolitan Park addition	1,500
H. A. Knoll, frame dwl., McFaul's addition	4,000
C. M. Williams, frame dwl., Vine Place addition	1,000
J. C. Meacham, frame dwl., Rose Hill addition	1,000
Geo. M. Lyon, frame dwl., Hedges Morningside addition	2,000
Peter Eastlund, frame dwl., Holman's addition	1,200

Lye & Fisher were awarded the contract for the plumbing and heating for the hospital for the Florence Crittenton home for \$7,436. It will be vacuum steam system and will have smokeless fire box, boilers. Beuttler & Arnold, architects, Security building.

F. E. Colby, architect, Davidson building, has completed

plans for a residence for Ed. Bender at 27th and Jackson sts., to cost about \$7,000. Plans are in the hands of contractors and bids will be taken soon.

Geo. W. Burkhead, architect, Grain Exchange building, is drawing plans for a residence for M. E. Southwick at Merville, Iowa. It will be 36x30, 2-story and basement, hot water heat, and will cost about \$4,000.

Beuttler & Arnold, architects, Security building, are drawing plans for a residence for F. M. Pelletier at 1420 Summit av. Cost about \$6,500.

Beuttler & Arnold, architects, Security building, are drawing plans and specifications for the Morningside Country club.

The corner basement room of the Burleigh flats is being remodeled for a restaurant.

OMAHA, NEB.

Mail news to Minneapolis office not later than Wednesday.

The National Printing Co. has built an addition, 30x40, brick to their store room.

The People's Ice & Cold Storage Co. will erect a building, 2-story brick, fireproof, gravel roof, plans will be out Dec. 5. A 2-story residence, 24x32, will be erected by Wilson & Warren, contractors and owners; cost \$2,500; frame, stone, modern.

Preparation being made for paving and curbing part of Vinton st. and bids will be received until 2 p. m., Dec. 10, for construction of sewers in districts 481-486.

*Col. S. S. Curtis, owner of the building at 18th and Harney sts. is considering converting the building into a hotel.

*Geo. Rahn was awarded contract for new St. Paul's Lutheran church at 25th st. and Evans av. W. F. Gernhardt, architect, prepared plans.

*E. O. Hamilton local contractor, has been awarded contract for business block at 19th and Farnam st. by Harrison & Morton, agents, for Dr. Harold Gifford; cost \$20,000.

WINNIPEG, MAN.

The following permits were issued: Whitlaw & McFadden, dwelling, north side of McMillan av., between Wilton and Redwood sts., \$5,000; P. Lechtzier, dwelling, Dufferin av., \$1,700; R. Starkie, dwelling, Parker st., \$1,800; H. C. Scovil, dwelling, Scotia st., \$4,000; Western Supply Co., warehouse, south side of Pacific av., between Yeomans and Winks sts., \$1,500; city of Winnipeg, addition to stable, Pacific av., \$5,000; Smith Construction Co., two dwellings, Hetherington av., \$3,200; B. Sakusta, dwelling, Selkirk av., \$1,500; R. James, dwelling, Strathcona st., \$2,500.

The following permits were issued: G. Bernhardt, dwelling, Aberdeen av., \$2,000; E. L. Drewry, boiler house, Redwood av., \$1,000; H. Sigurdson, dwelling, McDermot av., \$4,000; C. H. Evanson, dwelling Garfield av., \$3,400; O. T. and E. Arnason, dwelling, east side of Garfield, between Yarwood and Wellington sts., \$3,400.

The C. P. railroad will double track 1,095 miles of rail between Port Arthur and Calgary. They will also build 436 miles of new railway in southern Alberta and southern Saskatchewan.

George A. Fuller Co., of Winnipeg, are the contractors for the proposed Playfair building, corner of Ellice and Garry sts.; Ross & MacDonald, architects, Union Bank building, Winnipeg.

A. D. S. Knight, Winnipeg, will erect a new apartment block on S. E. corner of Chestnut and Preston sts., to cost \$37,000; Jordan & Over, Winnipeg, are the architects.

The rural municipality of Kildonan, will erect a new school to cost \$20,000. H. Thompson, secretary-treasurer, 215 Chamber of Commerce, Winnipeg.

R. Cohn, builder and contractor, 357 Magnus av., city, will put up a block on corner of Pembina and Morley sts. Work will commence in March.

Bids are wanted to Dec. 8, by chairman of board of control, Winnipeg, for labor and materials required to make repairs to city crematory.

Peter Lyall & Co., of Winnipeg, propose to start the erection of the Lyall building corner of Main and Water sts. in the spring.

T. D. Robinson & Sons, will erect a dwelling, on west side of Battery st., between Pritchard and Manitoba, to cost \$2,300.

**Employers' Liability Insurance
Surety and Fidelity Bonds.**

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THE LARGEST AGENCY OF ITS KIND
IN THE NORTHWEST

More than 50,000 personal
injury cases handled for
contractors and others
since 1892.

Security Bank Bldg.,

MINNEAPOLIS

PROPOSAL ADVERTISING FOR BIDS.

MOODY COUNTY COURT HOUSE.
Flandreau, S. D.

Sealed proposals, directed to Mr. G. A. Chorpening, County Auditor, Flandreau, S. D., and endorsed, "Court House" will be received on or before the 6th day of January, 1914, at 2 o'clock P. M., for all labor and material required in the erection and completion of a stone, three-story, fireproof Court House, according to plans and specifications prepared by Joseph Schwarz, architect, Sioux Falls, S. D.

Said bids will be opened at the first above mentioned time and place, by the Commissioners of Moody County, S. D., who reserve the right to reject any and all bids.

Each bid is to be accompanied by a certified check of a sum equal to 2 per cent of the amount of the proposal, made payable to Edgar A. Hornby, Treasurer.

Copies of the plans and specifications are on file at the Builders' Exchange in St. Paul and Minneapolis, Minn.,

while a limited number may be obtained, upon a deposit of \$20.00, from the County Auditor by general contractors, the same to be returned within 10 days after they are loaned, when the deposit money will be returned.

Contractors desiring the loan of a set of plans, for their own use and for the purpose of estimating only, can procure them from the architect, upon a deposit of \$20.00. Said plans shall be returned to the architect, at the time of letting, whereupon one-half of the deposit will be refunded.

GEO. A. CHORPENING,
County Auditor,
Flandreau, S. D.

NOTICE TO ELECTRIC EQUIPMENT CONTRACTORS.

Notice is hereby given that sealed bids will be received at my office to be opened by the City Council at a meeting on the 15th day of Dec., 1913, at 8 P. M., for the delivery, installing and connecting to the switchboard of one 100-K. W. Alternating Generator, one Exciter and one First-class High Speed Engine.

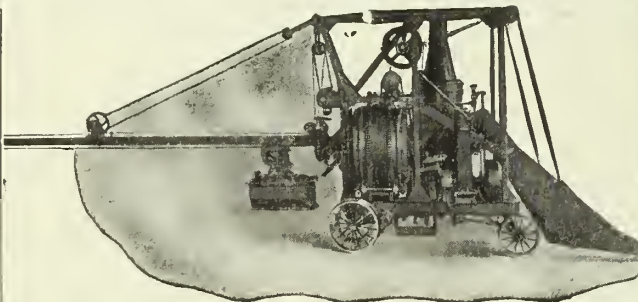
For specifications write the City Clerk.

The Council reserves the right to reject any or all bids.

C. J. STARK,
City Clerk.

Dated at Ortonville, Minn.
This 1st day of Dec., 1913.

(Continued on page 28.)



A road mixer with sterling credentials

A machine such as a road mixer must have more than just claims back of it before you'll invest. It must be backed by recommendations of unquestionable value.

KOEHRING

Street Paving Mixers are particularly solid in this respect. We make strong claims for the KOEHRING with its "3 in 1" mixing movement, but we back up each claim with equally strong credentials from reputable users. An interesting "3 in 1" booklet, No. 18, is ready for you.

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N. W. Branch Office, H. B. Jones, Dist. Mgr.,
350-352 Security Bank Bldg. Minneapolis



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Roads Made With
Atlas Portland
Cement increase in
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harder with age.

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THE ATLAS PORTLAND CEMENT CO.

30 BROAD ST. NEW YORK

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300 Morris Bldg. Philadelphia, Pa. Plymouth Bldg. Minneapolis, Minn.

Productive capacity over 50,000 barrels per day — largest in the world.



STREET AND ROAD WORK

Notes Arranged Alphabetically by States.

Ill., Elgin—The bids to be received by the board of local improvements on Dec. 10, are for asphaltic macadam, not for brick, as erroneously announced last week; at the same time bids will be taken for about 4,500 square yards of brick pavement.

Iowa, Belle Plaine—Plans for 40 blocks of brick, concrete, asphaltic concrete or Dolarway paving are being prepared by the Iowa Engineering Co., Clinton, Iowa; Dr. Collins, mayor.

Iowa, Cherokee—A petition for several blocks of paving on W. Main st. is being generally signed; address the city clerk.

Iowa, Decatur City—The subject of paving is being agitated here; address the city clerk.

Iowa, Des Moines—The Polk county supervisors plan to begin work next season graveling a county road system of 163 miles, and estimated to cost \$175,000; address the county auditor.

Iowa, Le Mars—Plymouth county will spend \$135,000 for road and bridge construction during 1914; address the county auditor.

Iowa, Leon—The city council is getting ready to order more paving for next year; address the city clerk.

Iowa, Muscatine—The chamber of commerce urges the paving of 2d st., from Chestnut st. to Mulberry av.; address the city clerk.

Iowa, West Union—The streets of this city are being surveyed by Engineer Schurgie, Dubuque, Iowa, who will later make blue prints of the streets to be paved in the spring; the intention is to start the legal machinery as soon as the blue prints are ready so that bids may be advertised for as soon as possible and the actual work begun early in the spring.

La., Lafayette—Bidders on the proposed work on 16 miles of public highway were as follows: Worthington Construction Co., Brookhaven, Miss., \$47,813; G. W. Pruttsman, Danville, Ill., \$50,634; Nicholas & Jones, Lake Providence, La., \$52,484; Boyd & Bradshaw, Columbia, Miss., \$58,364; Texas Grading Co., Houston, Texas, \$58,555; Ritchie & Co., Camden, Ark., \$64,283; Thos. Larkin, Sherman, Texas, \$68,645. The bid of Worthington & Co. is recommended for acceptance to the police judge of Lafayette Parish; C. C. Sandoz secretary.

Minn., Barnesville—The county board expect to purchase road machinery at their meeting in January; address the county auditor.

Minn., Crookston—Hearing Dec. 9 on the matter of graveling Lincoln av. from Bridge to McGraw st.; A. M. Childs, city clerk.

Minn., Duluth—The work of making Commonwealth and Zimmerly avs., New Duluth, is to be started as soon as possible; address C. E. Lovett for further particulars.

Minn., Kasson—Bids received by Geo. L. Taylor, county auditor, until 10 a. m., Dec. 15, for two road graders and one traction engine.

Minn., Mankato—Bids received by C. L. Kennedy, until 2 p. m., Dec. 16, for grading from station 225 to station 255, approximately 3,200 cubic yards of earth, approximately 400 cubic feet of rip-rap; 18-inch concrete culvert at station 234 plus 15, 12-inch corrugated metal culvert at station 238 plus 35; 18-inch concrete culvert at station 240 plus; 12-inch culvert at station 251 plus 36; check for 10 per cent.

Minn., West St. Paul—Bids received by M. P. Boege, city clerk, until 6 p. m., Dec. 8, for a wooden sidewalk on the south side of the Dodd road, between Smith and Cherokee avs.

Mont., Billings—Plans are before the council for the paving of all streets in the residence district; a twenty foot strip of wood block paving is proposed for the middle and fifteen feet of cement, with curb, on each side; address the city clerk.

Mont., Dillon—Bidders for the Dillon Side of the Darby-Big Hole highway recently were the Clifton-Applegate Co., Spokane, Wash., which have the contract for the road on the other side, and Peter Ivanhoff; the bid of the first was \$13,575 and of the latter \$13,750. These both exceed the available funds, but it is expected that the difference will be secured and the award made to one of them.

N. D., Bismarck—Bids received by R. H. Thistlethwaite, city auditor, until 8 p. m., Dec. 15, for grading on 7th st., etc.

Ont., Fort Francis—Sum of \$4,610 has been appropriated for the construction of granolithic walks.

Ore., Portland—An appropriation of \$408,000 for road purposes during ensuing year has been recommended by highways advisory committee in communication to county commissioners. Committee would spend \$158,000 on Columbia

River highway; \$210,000 on roads in district No. 1 and \$40,000 in district No. 2.

Texas, Alpine—An election will be held Dec. 20, in Brewster county to vote on a bond issue of \$100,000 for highways; address the county engineer.

Texas, McKinney—The proposed election for this county to vote on bonds for goods roads has been called for Dec. 16, and the amount to be voted on will be 450,000; the purpose is to build 100 miles of macadam roads.

Texas, Tyler—S. C. Dreyfus, a highway engineer of Alabama, has been employed to make preliminary surveys for the good roads work to be done with the \$300,000 of bonds recently issued.

Wash., Davenport—The state highway commission at Olympia will probably let contracts early in January for 5¾-miles of Davenport-Harrington state road.

Wash., Olympia—Bids received by W. J. Roberts, secretary of the highway board, until 2 p. m., Dec. 22, for about 9 miles of road improvements on the Pacific highway and the Sunset highway; check for 5 per cent.

Wash., Prosser—Plans are being prepared by C. D. Walker for a 17-mile highway between Prosser and Benton City, estimated to cost \$100,000.

Wash., Seattle—De Flong & Anderson at \$19,465 were the lowest bidders for resurfacing Whitman av. Other bids received were: H. Pederson, \$19,701; Krogh & Jessen, \$19,930; D. H. Traphagen, \$19,943; S. Normile, \$20,223; and Wenzler & Ward, \$20,465.

Wis., Delavan—The council has ordered the paving of Walworth av., from Terrace to 8th st., and the board of public works will ask the engineer to file plans and specifications for laying the pavement; address the city clerk.

Wis., Fond du Lac—M. Costello, county highway commissioner, has asked the county board for one steam roller, a concrete mixer, two stone crushers, and miscellaneous tools, amounting in all to about \$5,000.

Wis., Green Bay—Surveys for about four miles of paving are being made by August Brauns, city engineer; to mature in the spring. New bids will be advertised for in the spring for the paving of Cass, Clay and Harrison sts.

Wis., Oconto—Jas. Deveraux, county commissioner, recom-

Before the Winter Winds Come---Be Prepared

When you are making final repairs for the winter, do not fail to mention LINO FELT to your customer. Put it in the walls and roof of his home, and the comfort and saving in fuel which the use of this greatest of all Cold, Heat and Sound Insulations will give him, means an increase of business for you. New or Old Buildings---There is a way. We have it. Write To-day.

UNION FIBRE COMPANY, :: :: :: Winona, Minn.

PROPOSAL ADVERTISING FOR BIDS

WANTED---PLANS FOR WELL.

The Water Works Committee of the City Council of Eagle Grove, Iowa, want to correspond with an architect of experience in plans and specifications for digging a well 16 feet in diameter and about 60 feet deep, curbing to be of rock; also giving estimate of cost of same.

Address SAM MIDDLETON,
City Clerk,
Eagle Grove, Iowa.

EXCAVATION AND FOUNDATION WORK FOR THE NORTH WING AND THE NORTHEAST AND NORTHWEST CORNER PAVILIONS OF THE WISCONSIN STATE CAPITOL.

The Capitol Commission of Wisconsin invites proposals for furnishing the necessary labor and material for the Excavation and Foundation Work for

the North Wing and the Northeast and Northwest Corner Pavilions of the Wisconsin State Capitol now building at Madison, Wisconsin.

This work is to be executed in accordance with the plans and specifications prepared by George B. Post & Sons, Architects, and is to be done under their supervision and direction.

Plans and specifications for the work may be examined at the following place, viz:

The office of the Architects, 101 Park Avenue, New York.

The office of the Capitol Commission, new South Wing of the Capitol, Madison, Wisconsin.

The Builders' & Traders' Exchange, Milwaukee, Wisconsin.

The American Contractor, 180 N. Dearborn St., Chicago, Ill.

The Improvement Bulletin, Lumber Exchange Building, Minneapolis.

Plans may also be obtained for the individual use of prospective bidders by depositing with the undersigned a certified check of \$100.00, which check will be returned to the maker upon the return of the plans.

All proposals must be made on printed blanks and must be accompanied by a certified check (in amount of 5 per cent of the total proposal) which will, in case the proposition of the maker is accepted and he fails within ten days to execute a satisfactory contract and furnish a bond as provided by law, be forfeited.

Proposal blanks may be secured by application to the undersigned, to whom all proposals must be delivered, sealed and properly endorsed, by 10 a. m., Friday, Dec. 19, 1913.

LEW F. PORTER, Secretary,
Capitol Commission of Wisconsin.
Madison, Wisconsin.
November 24, 1913.

(Continued on page 30.)

sky Bros., city, for 128,000 cubic yards grading in Main st.; Curtis Hill, city engineer.

Mont., Hamilton—Contract for the 40,000 feet of the Bitter Root-Big Hole wagon road has been awarded to Geo. Keith at \$11,950.

Ore., Jacksonville—Contract has been made with Kessell & McDowell Logging Co., Tacoma, Wash., for grading the Pacific highway over the Siskiyou mountains at \$107,534; other bidders were as follows: Ambrose Birdsall Co., Portland, \$124,139; E. F. Johnson, Portland, \$110,903; P. McD. Fuller, \$134,663; Jeffries & Bufton, Portland, \$119,739; Hayden Bros., Eugene, \$134,010; J. W. Sweeney, Portland, \$145,900; Barber Asphalt Paving Co., \$115,478; Turner Co., San Francisco, \$108,716.

Wash., Prosser—Contract has been let to A. H. Zane, Hartford, at \$16,995, for grading 8 miles of highway No. 3. Other bidders were: O. S. Brown, Prosser, \$22,000; Langford & Matthewson, Sunnyside, \$15,990, and Wm. Moraine, Kennewick, \$16,580.

Wash., Seattle—Contract has been made with J. H. Cullen & Co., for grading W. 68th st., at \$6,533; also with Hanson & Co., for planking Rainier av., at \$14,040.

SEWERS

Notes Arranged Alphabetically by States.

Ida., Boise—Plans will soon be completed for the proposed sewers in South Boise; O. C. Stevenson, city engineer.

Iowa, Bloomfield—Bids received by A. B. Welch, city clerk, until Dec. 16, 8 p. m., for about 3,500 feet of sanitary sewer, to be of 6 and 8-inch vitrified tile, with manholes, lamp holes and flush tanks where needed; check for \$400.

Iowa, Dubuque—The city engineer has been instructed to prepare plans and specifications for connecting certain property with sanitary sewers.

Iowa, Dubuque—Bids received by J. J. Shea, city recorder, until 8 p. m. Dec. 2, for storm water sewer on West 5th st., in all 850 lineal feet of 24-inch sewer pipe and 4 manholes; check for \$150.

Iowa, Grinnell—Bids will soon be asked for on main and lateral sewers and disposal plant, to cost about \$20,000; A. C. Harriman, city clerk.

Iowa, Sheridan—Plans for a sewer system to cost about \$50,000 are being made by the Iowa Engineering Co., Clinton, Iowa; address the city clerk.

Iowa, Sioux City—City Engineer Fred Smith has begun

estimates for the proposed conduit for Perry creek from W. 7th st. to the Missouri river.

Kan., Wichita—Preliminary plans for 2,700 feet of vitrified pipe sewer are being prepared by Bert Wells, city engineer; Wm. Sence is city clerk.

Minn., Duluth—Petition has been granted for a sewer on Duluth av.; city auditor instructed to advertise for bids on sewer and water connections on Phillips av. from 7th to 12th st.; Walter C. Leyse, city auditor.

Minn., Hastings—L. W. Clark, Stillwater, has been taking levels on 2d st. for the sewer extension.

Minn., St. Paul—Bids received by Leonard C. Seamer, clerk of the board of public works, until 2 p. m., Dec. 11, for a sewer on Talula place, from Clayland av. to Fairview av.; also for a sewer on Sylvan st. from Jessamine st. to Geranium st.; also for a sewer on Jessamine st. from Abell to Cortland st.; also for a sewer in Roy st. from University av. to Shields av.; also for a sewer on Herschel av. from St. Anthony av. to Rondo st.; also for a sewer on Blair st. from Fry st. to Snelling av.; also for a sewer on Montrose av., from Marshall to Dayton av.; also for a sewer on Orange from Payne to Greenbrier av. A certified check in each case for 10 per cent.

Minn., St. Peter—The city clerk has been instructed to advertise for bids for a rock sewer on Minnesota av. and for a tile sewer on Chestnut st., bids to be opened Dec. 22.

Mo., Springfield—Bids will be received by C. E. Phillips, city engineer, or J. H. Langston, city clerk, probably early in January for approximately 5 miles of 8 to 12-inch vitrified pipe sewer.

Mont., Fort Benton—The Commercial club will submit a plan to the town council for bonding the town for a sewer system; address the city clerk.

Mont., Malta—Contract has been let to Geo. W. Kemper, Minot, N. D. for sewers in new districts recently created.

Neb., Hastings—Contract has been made with E. R. Ring, for work in sewer district No. 68.

Neb., Omaha—Bids received by Watson Townsend, city engineer, until 2 p. m. Dec. 10, for the construction of sewers in sewer districts Nos. 481, 482, 483, 484, 485 and 486; check for 5 per cent.

Neb., Ravenna—Plans and estimates for a sewer system for this city are being drawn by Grant & Fulton, Lincoln, Neb.

Neb., Scottsbluff—Plans for 21,000 feet of 8 and 10-inch sanitary lateral sewers are being prepared by Yoder & Liljenstälpe, city.

Neb., Wayne—Bids will be called for in the near future for the proposed extension of the sewer system in the eastern part of town, estimated to cost in the neighborhood of \$2,500; address the city clerk.

S. D., Sioux Falls—Fanebust Bros. were the only bidders for sewers on Minnesota and Dakota avs.; totaling about \$2,000.

S. D., Yankton—Hearing Dec. 29, on the extension of a lateral sewer now existing along the alley which runs north and south in block 16 in that part of the city known as Witherspoon's Yankton.

Wash., Puyallup—Two storm sewer improvements, calling for a bond issue of \$3,716 have been decided upon by the council; address the mayor.

Wis., Marshfield—A sewer to cost about \$7,000 is contemplated here for the early spring; John Seubert, city clerk.

CONTRACTS AWARDED.

Ida., Emmett—Contract has been awarded to Parrott Bros., Salt Lake City, Utah, for constructing a sewer system, at \$12,744.

Kan., Council Grove—Contract has been let to Everett & Burt, Hutchinson, for three miles of sewers at \$20,337.

Minn., Pipestone—Contract has been made with G. Redmon for the sewer work; Fred Hatfield was the low bidder, but he was unable to enter into contract to do the work owing to charter provision. S. W. Funk, city clerk.

S. D., Bridgewater—Contract for the branch "A" sewer has been awarded to the Pioneer Bridge Co.

Texas, Bay City—Contract has been made with the Cardwell Construction Co. for a nine-mile sewer system, to cost about \$28,000.

Texas, Kingsville—Contract has been let to the Hamilton Bros. Construction Co., Taylor, for a sewage disposal plant comprising a reinforced settling tank, sludge beds and sterilization chamber, large enough to treat 400,000 gallons daily.

Wis., Manitowoc—Contract has been made with Walter Brey for the sewers on N. 12th and N. 6th sts., at \$1,009.

DRAINAGE AND IRRIGATION

Notes Arranged Alphabetically by States.

Iowa, Harlan—Hearing Dec. 18 on proposed ditch, Clay township, Shelby county; E. A. Schell, county auditor.

Iowa, Muscatine—Advertisements for bids will be published at once (in spite of court order) for the work of drainage district No. 13; plans and blue prints received by County Auditor Schoemaker; over 400,000 cubic yards of earth to be excavated, main and lateral ditches, amounting to nearly seventy-five miles from Muscatine slough, to Fort Louisa, and to the mouth of the Iowa river; total general length, about forty miles; pumping station to cost \$200,000 on Mississippi at Fort Louisa; bids for pumping station will be opened Dec. 23; petition for rehearing of case not expected to delay work, any length of time; supreme court will meet Dec. 9, and arguments expected soon after; numerous lakes along Mississippi between Muscatine and mouth of Iowa river will be drained.

Iowa, Storm Lake—Bids received until 10 a. m., Dec. 10, on improvements in district 45; tile and sewer pipe for catch basins; constructing, furnishing material except tile necessary for completing drains, according to plans by engineer; bond for 25 per cent; 1,100 feet 16-inch, 4.25 foot average depth; 14-inch, 1,700 feet, 6.73 feet 12-inch, 1,894 feet 5.15 feet, 4 catch basins, 1 bulk head of two yards, 1 railway crossing, 991 feet 6-inch, 4.84; 420 feet 6-inch, 4.74; 1 catch basin; 100 feet 16-inch cast iron pipe, 24 feet 6-inch cast iron pipe, average haul less than one mile; W. W. Bennett, county auditor.

Minn., Bemidji—First hearing 10 a. m., Jan. 3, on proposed judicial ditch 27, Beltrami county; main and four laterals; F. W. Rhoda, clerk of district court.

Minn., Bemidji—First hearing 10 a. m., Jan. 3, on judicial ditch 28.

Minn., Mankato—Bids received until 2 p. m., Dec. 17, for digging and constructing ditch 34, Blue Earth county, estimated work, 38,085 lineal feet hauling and laying 4,355 feet 8-inch tile, 9,340 feet 10-inch, 8,600 feet 12-inch, 10,795 feet 14-inch, 355 feet 18-inch, 3,640 feet 24-inch; 1 concrete head wall; estimated cost of ditch, \$13,330; C. L. Kennedy, auditor, Blue Earth county.

Minn., Minneapolis—Bids received until 12 m., Dec. 29, for dredging in Lake Nokomis and filling low lands and boulevards, estimated material to be moved 2,000,000 cubic yards; check for \$1,000; J. A. Ridgway, secretary, park board.

Neb., Woodriver—Joe Riesland is installing two big irrigation plants near Cairo for J. E. Cox and L. Hinkson.

S. D., Belle Fourche—F. F. Lyon, attorney, Butte; H. R. Alban, civil engineer, Custer, S. D.; A. W. McConnell, Chicago, have gone to Custer county, Mont., on an irrigation project to include 25,000 acres north of Little Missouri and twelve miles below Alzada.

Wis., Cumberland—Bids received until 2 p. m., Dec. 15, for digging drainage ditch in towns of Maple Plains and Crystal Lake, Barron county; approximate excavation, 13,442 cubic yards; bids received at the law office of H. S. Comstock, Cumberland.

BRIDGES

Notes Arranged Alphabetically by States.

B. C., Vancouver—Plans, specifications and estimates for four concrete viaducts over the G. N. tracks have been completed by city engineer, F. L. Fellowes, Turner's mushroom flat-slab system; cost \$540,000. Tenders may be called for these before the first of the year.

Iowa, Des Moines—Council adopted plans for a concrete bridge over the Raccoon river, with viaduct over the railroad tracks; cost \$185,500. Construction work will be planned as soon as the railroad commission orders the railroads to erect viaducts.

Iowa, Maquoketa—Bids received till 2 p. m., Dec. 18, for construction of following bridges, in Perry township, concrete estimated cost \$700, in Maquoketa township, concrete cost \$640; and one in same township to cost \$350, one in Washington township, cost \$360, in Morts township, cost \$525, in Prairie township, steel and concrete, cost \$1,500, in Farmers' Creek township, 18-foot span, steel and concrete, cost not estimated, bridge No. 36, in Richland township, pony truss set on tubes, bridge No. 7, Perry township, 50-foot pony truss, bridge No. 19, Tete des Morts township 90-foot steel span, bridge No. 1, Otter Creek township, pony truss. All bids must be on sealed blanks furnished by county auditor, H. E. Strain; check for 10 per cent. J. P. McCullough, county engineer.

Mont., Belgrade—A new steel bridge for the East Gallatin river at the Wm. Flannery ranch has been ordered by the

PROPOSAL ADVERTISING FOR BIDS.

PROPOSALS WANTED.

Jail and Sheriff's Residence, Carlton, Minn.

Sealed proposals will be received by the County Board of Commissioners, Carlton County, Minnesota, August R. Norman, County Auditor, for the erection and completion of a Two-Story Jail and Sheriff's Residence to be erected at Carlton, Minnesota, according to plans, specifications and details as prepared by the Architects, Vernon J. Price & Company. Said proposals to include separate bids on General Contract, Plumbing, Heating, Wiring and Cell Work. Sealed proposals on the above work will be opened by the County Board of Commissioners, at Carlton, Minnesota, at 10 o'clock on Jan. 6, 1914. A certified check shall accompany each bid, made out to the order of William Gallagher, County Treasurer. Said certified checks to be of the following amount as covered by each part of the work:

General Contract	3% of Bid
Cell Work	5% of Bid
Plumbing	10% of Bid
Heating	10% of Bid
Wiring	5% of Bid

Plans and specifications are on file at the office of August R. Norman, County Auditor, Carlton, Minnesota, and at the offices of the Architects, Vernon J. Price & Co., 608 Palladio Building, Duluth, Minn., or Rexall Block, Crosby, Minn. Separate copies of plans, specifications and details for personal use may be had upon application to the architects, accompanied by a check of \$10, which will be returned to bidder when plans are returned.

The right to reject any of said bids is reserved by the County.

By order of County Board, Carlton, County, Minn.

By AUGUST R. NORMAN,
County Auditor,
Carlton, Minn.

BID FOR JAIL WORK.

The undersigned hereby gives notice that sealed proposals for the erection and completion of the jail cells, corridors and doors for the jail department of the municipal building, Aberdeen, S. D., including all labor and materials, will be received by Geo. F. Fossum at his office until the hour of 10 A. M., on the fifth day of January, 1914.

All bids must be in strict accordance with the plans and specifications, prepared by Geo. F. Fossum, Architect, of Aberdeen, S. D.

A certified check for 4 per cent of the bid, payable to the order of the City Treasurer, must accompany each bid

as a guaranty, the same to be returned to unsuccessful bidders immediately on letting contract. The party to whom the contract is awarded will be required to give a satisfactory bond in the sum of the full amount of the bid for the faithful performance of the contract. The right is reserved to reject any or all bids.

Signed F. W. RAYMOND,
City Auditor.

Dec. 1, 1913.

NOTICE.

The undersigned hereby gives notice that sealed proposals for the erection and completion of a solid brick and stone school building, including all labor and material, will be received by the School Board at Mauston, Wis., until the hour of 4 P. M., on the 29th day of December, 1913.

All bids must be in strict accordance with the plans and specifications prepared by Parkinson & Dockendorff, Architects of La Crosse, Wis., which may be had on application to the Architects.

A certified check for two (2%) per cent of the amount of bid payable to the order of the School Board, must accompany each bid as a guaranty, the same to be returned to unsuccessful bidders immediately on the letting of the contract.

The party to whom the contract is awarded will be required to give a satisfactory bond of fifty (50%) per cent of the amount of contract for the faithful performance of the contract.

The Board reserves the right to accept any or reject any or all proposals presented.

Signed: M. L. BUNNELL,
Clerk.

ELECTRICAL CONSTRUCTION FOR POWER PLANT ROCHESTER STATE HOSPITAL, ROCHESTER, MINNESOTA.

Sealed proposals will be received by the State Board of Control at their office, in the State Capitol Building, St. Paul, Minn., until 2 P. M., Wednesday, December 17th, 1913, for electrical construction for power plant, Rochester State Hospital, Rochester, Minnesota, in accordance with the plans and specifications of Charles L. Pillsbury Co., Engineers, 805-811 Metropolitan Life building, Minneapolis.

Bids are to be submitted only on forms supplied by the Engineers. No other form of bid will be considered. Bids are to be accompanied by certified check for five per cent of the amount of bid, payable to the State Board of Control, which check will be returned when contract is executed.

Copies of the above plans and specifications may be seen at the Superintendent's office, State Hospital, Rochester, at the Builders' Exchange, Minneapolis, at the Builders' Exchange, St. Paul, at the office of the Board of Control, and at the office of the Engineers. Extra copies of plans and specifications may be obtained on application to the Engineers on payment of cost of duplication. Successful bidder must furnish the Board with a surety bond in 75 per cent of amount of contract. The right is reserved to accept or reject any or all bids.

TELEPHONE SYSTEM AND WATCHMAN'S CLOCK SYSTEM FOR ROCHESTER STATE HOSPITAL, ROCHESTER, MINNESOTA.

Sealed proposals will be received by the State Board of Control at their office, in the State Capitol building, St. Paul, Minn., until 2 P. M., Wednesday, December 17th, 1913, for telephone system and watchman's clock system, Rochester State Hospital, Rochester, Minnesota, in accordance with the plans and specifications of Charles L. Pillsbury Co., Engineers, 805-811 Metropolitan Life Building, Minneapolis.

Bids are to be submitted only on forms supplied by the Engineers. No other form of bid will be considered. Bids are to be accompanied by certified check for five per cent of the amount of bid, payable to the State Board of Control, which check will be returned when contract is executed.

Copies of the above plans and specifications may be seen at the Superintendent's office, State Hospital, Rochester, at the Builders' Exchange, Minneapolis, at the Builders' Exchange, St. Paul, at the office of the Board of Control, and at the office of the Engineers. Extra copies of plans and specifications may be obtained on application to the Engineers on payment of cost of duplication. Successful bidder must furnish the Board with a surety bond in 75 per cent of amount of contract. The right is reserved to accept or reject any or all bids.

WANT ADS SPECIAL NOTICES

NOTICES under this heading will be inserted at the rate of fifteen cents per line, each insertion; no notice inserted for less than 50 cents.

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county commissioners to replace the recently wrecked wooden structure.

Wis., Nekoosa—It was voted to build a bridge across the Wisconsin river costing \$35,000, this city to pay \$15,000, Wood county \$15,000 and the state \$7,500.

Wis., Superior—In the construction of the proposed Ashland-Superior road wooden bridges across Derman's creek and Brule river will have to be rebuilt, 16 ravines will have to be bridged, a new bridge over the Annicon river, from the Annicon river west to the Itasca road are several small bridges that will have to be replaced; estimated cost, Ashland to Washburn including grading, culverts and bridges, \$145,000; for further information write W. J. Leader, clerk of Douglass county.

CONTRACTS AWARDED.

Iowa, Clinton—Anton Stuhlman was awarded contract for

construction of a bridge near the Champlin stables at the city limits.

Mont., Bridger—Contract for a bridge flume has been let to Morris Lavonder by the Sand Creek Ditch Co., the bridge is to be a 2-span structure across the Cottonwood.

S. D., Colome—Standard Bridge Co. received contract to build all bridges in Tripp county for the year.

Wis., Bayfield—The Hennepin Bridge Co. has begun work on the steel bridge across Fish Creek.

Wis., Green Bay—Contract for construction of Main st. bridge over the Fox, to replace the one broken by a street car sprinkler has been awarded to Greiling Bros., local contractors; cost \$3,500. It will be steel bascule.

Wis., Sheboygan—The Optenberg Iron Works, Sheboygan, is erecting the new steel viaduct over the C. & N. W. railroad on 17th st.

PUBLIC BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Edmonton—Bids have been called for on an armory to cost between \$500,000 and \$600,000 to replace the building recently destroyed by fire; address the mayor.

Colo., Boulder—Plans for the new jail for the county have been submitted by W. N. Bowman, the cost to be \$50,000.

Colo., Grand Junction—Bids received by O. Wenderoth, supervising architect, Washington, D. C., until 3 p. m., Jan. 6, for the construction complete (including mechanical equipment) for the construction of a United States postoffice building.

Idaho, American Falls—Plans for the city hall building, prepared by J. P. Hayward, have been submitted to the city council.

Idaho, Kellogg—The council has approved the plans of L. R. Strittesky, architect, Spokane, Wash., for a jail and fire station; building to be of stone and brick, and the estimated cost is \$9,000.

Ill., Edwardsville—Bids for the United States postoffice building here were as follows: (a) limestone, (b) sandstone; W. D. Lovell, Minneapolis, Minn., (a) \$53,750; W. J. Turner Co., Chicago, (a) \$66,307, (b) \$68,807; Volney E. Taylor, Building & Construction Co., St. Louis, Mo., (a) \$55,507, (b) \$56,507; R. S. Moore, Lafayette, Ind., (a) \$54,000, (b) \$55,980; N. H. Shields, Danville, (a) \$52,527.

Iowa, Boone—No decision has yet been made on the plans for the new court house and it may be some time before any conclusion is reached; new, or at least modified, plans may have to be drawn.

Iowa, Eagle Grove—J. H. Albright, architect, Fort Dodge, Iowa, has prepared plans for the city hall and fire station, for which contract will be let later. The building is to be 50x88, two stories, brick and will cost about \$17,000; foundation of brick and cement, pressed and common brick, Bedford stone, gravel roofing, metal cornice, common and plate glass, stucco plaster, steam heat, tile and wood and cement floors interior finish of oak and yellow pine, bath rooms, electric lights, fireproofing, hollow tile, iron beams and columns, mosaic work, marble, plumbing, skylights, terra cotta, vaults and ventilators.

Iowa, Fort Madison—M. E. Bannon, city engineer, has been directed to prepare plans and estimates for the proposed city hall building, to be modern and fireproof.

Iowa, Imogene—A new town jail is to be built here; address the village clerk.

Kan., Concordia—The following were the bidders on the proposed U. S. postoffice building: (a) limestone; (b) sandstone: W. D. Lovell, Minneapolis, Minn., (a) \$60,425; Geo. A. Shaul, Seneca, Kan., (a) \$63,112; Hiram Lloyd Building & Construction Co., St. Louis, Mo., (a) \$59,744 and (b) \$59,244; Rogers & Kaiser, Chicago, Ill., (a) \$62,724, (b) \$69,924; Clarence Johnson, Manhattan, Kan., (a) \$69,750, (b) \$72,250; Alexandria & Beeler, Ottawa, Kan., (a) \$65,000 (b) \$68,000.

Kan., Greensburg—Bids received by Harry Paxton, county clerk, until noon, Dec. 20, for the court house of Kiowa county. All work to be let under one general contract; 70x90, 2-story and basement reinforced concrete, brick and tile construction, gravel roof over concrete and stone trim; plans by W. E. Hulse & Co., architects, Woodward, Okla., furnished on a deposit of \$10; check for two per cent.

Minn., Brainerd—The county board has decided to build a new jail without delay, and a meeting arranged for, to be held Dec. 2, when plans may be submitted; several architects have already submitted plans for a building to accommodate 30 to 35 inmates, and to cost from \$32,000 to \$43,000; address the county auditor.

***Minn., Carlton**—Bids received by August R. Norman, auditor Carlton county, until 10 a. m., Jan. 6, for a jail and sheriff's residence. Former bids rejected. Officially advertised in this issue of the Improvement Bulletin.

Mo., Columbia—A contract will be let in January for a \$250,000 library building for the University of Missouri; A. R. Hill, president.

Mont., Dillon—Plans for the proposed city hall have been presented to the council for approval; address the city clerk.

Mont., Plentywood—A committee of which C. J. Beiseker is a member, has been appointed to secure a site and ascertain the cost of building a fire hall.

Mont., Wibaux—Plans for the new jail have been presented to the council by H. E. Fearnell, engineer, Miles City, Mont.

N. D., Beach—Bids received by M. C. McCarthy, auditor Golden Valley county, until 2 p. m., Jan. 5, for four steel book safes.

N. D., Mandan—A telegram is reported to have been received from Washington to the effect that the recent bid of W. D. Lovell, Minneapolis, Minn., at \$49,400 for the federal

building here, was for limestone construction, and that it would not be accepted.

Ohio, Salem—Bids received by O. Wenderoth, supervising architect, Washington, D. C., until 3 p. m., Jan. 7, for the construction complete of a United States postoffice building.

***S. D., Aberdeen**—Bids received by Geo. F. Fossum, architect, until 10 a. m., Jan. 15, for the completion of the jail department of the municipal building. Officially advertised in this issue of the Improvement Bulletin.

Texas, Abilene—Bids received by E. M. Overshiner, of the county court, until Dec. 18, for the Taylor county court house, to cost \$150,000; 80x140; 3-story, built of dressed stone, fireproof, metal trimmed.

Texas, Groveton—Bids received by C. M. McKinnon, county judge, until 3:30 p. m., Dec. 9, for the court house of Trinity county; brick, stone, steel and cement construction; plans by O. H. Page & Bro., architects, Austin, Texas, and can be obtained by a deposit of \$25.

Texas, Kingsville—Kleberg county has recently voted in favor of a bond issue of \$125,000 for a court house; address the county auditor.

Wash., Fort Worden—The quartermaster general has directed the construction quartermaster at this point to call for bids for the construction of a bakery at the post.

Wash., Malden—A bond issue of \$7,000 has been voted for a city hall; address the city clerk.

Wash., Newport—Bonds for the court house were defeated at the special election.

Wis., Delevan—The Northern Construction Co., Milwaukee, Wis., was low bidder on the federal postoffice here; their figures were \$57,200 for limestone and \$58,100 for sandstone construction.

***Wis., Madison**—Bids received by Lew F. Porter, secretary capitol commission, until 10 a. m., Dec. 19, for excavation and foundation work on the state capitol. Postponement of letting. Officially advertised in this issue of the Improvement Bulletin.

Wyo., Casper—All bids on the U. S. postoffice here have been rejected.

CONTRACTS AWARDED.

Alta., Edmonton—Contract awarded to Gison & Johnson Co., Missoula, Mont., for the city market building at \$85,000.

Ark., Dardanelle—Contract has been made with L. R. Wright Co., Little Rock, for the court house here.

Idaho, Idaho Falls—Contract for the brick work on the new fire station has been given to D. J. Sweeney, for \$1,500.

Ill., Blue Island—Contract for the U. S. postoffice has been let to N. H. Shields, Danville, Ill., at \$52,285.

Iowa, Fontanelle—Contract has been made with C. H. Cass, Bridgewater, Neb., to build a town hall, brick with cement floor and ceiling and to cost \$1,690.

Minn., Little Falls—Contract has been let to the Adams Hardware Co., city, for a steel ceiling and varnishing the rooms at the court house, at \$621.

Mo., Jefferson City—Contract for the superstructure of the new capitol building has been let to John Gill & Sons, Cleveland, O., at \$2,387,000. Other bidders were And. Dall & Sons, Cleveland, at \$2,338,800; Fuller Construction Co., New York, \$2,387,500; Jas. Stewart & Co., St. Louis, \$2,570,752; Phill-green Construction Co., \$2,781,000; English Bros., Champaign, Ill., \$2,560,000. Bids were made on Missouri lime stone, with alternate bids on other kinds of stone.

Neb., Beatrice—Contracts for the laundry building, addition to the boiler, etc., have been let as follows: Laundry building, Andrew Johnson, 1506 Military av., Omaha, at \$5,423; boiler room addition, J. F. Witzki, Beatrice, Neb., at \$1,265, and the main stairway at \$460; the iron stairway, Beatrice Iron Works, Beatrice, Neb., at \$295. Burd F. Miller, architect, Omaha, Neb.

N. D., Grand Forks—Contract for the vault doors and window shutters for the court house equipment was awarded to the Victor Safe & Lock Co., of St. Louis, Mo., at \$2,085. The only other bidder was the Diebold Safe & Lock Co., of Minneapolis, whose bid amounted to \$4,570. E. A. Braseth of Grand Forks secured the contract for installation of electric wiring and telephone conduits for the building at \$1,880; other bids received on this part of the work were: McGuire Electric Co., \$2,036; Electric Construction Co., of St. Paul, \$2,332; Monley & Smith, \$2,375; Olson & Boettger of St. Paul, \$2,773; Spriggs Bros., city, were given the contract for the plumbing, heating and ventilating apparatus, at \$12,273; the material will be furnished by the Western Supply Co.

N. D., Jamestown—Contract awarded to Bennett & Vessey for one Fairbanks Morse & Co. engine, 6 h. p., hopper cooled, with magnet, mounted on No. 15 steel truck, at \$210.

Okla., Granite—Contract for erecting the granite buildings at the state reformatory at Granite has been awarded to L. F. Lee, of Oklahoma City, at \$203,560. Other bidders: Roney & Culp, of Muskogee, \$220,500; Holmboe Construction Co., Oklahoma City, at \$204,600; Builders Warehouse & Supply Co., Muskogee, \$212,800.

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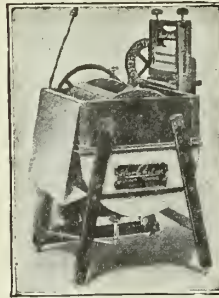


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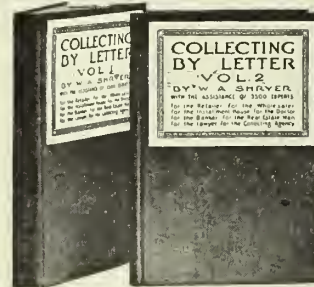
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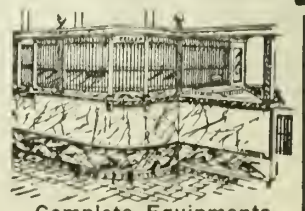
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ELECTRICAL

Notes Arranged Alphabetically by States.

Ida., Wallace—Wardner-Kellogg citizens have started a movement for the construction of an electric railway from the depot at Kellogg to the settlement in the upper part of Wardner.

Iowa, Hastings—The Hastings Mutual Telephone Co. has been incorporated by Geo. Shaw, president, J. E. Martin and others.

Iowa, Oskaloosa—The rural lines of the Home Telephone Co., will be rebuilt.

Iowa, Storm Lake—The Northern Telephone Co. will erect a new building.

Iowa, Westgate—The Hurmence Telephone Co. are building a telephone office here.

Mich., Bessemer—Bonds will be voted on by the village of Wakefield for \$5,000 to purchase electrical equipment.

Minn., Alexandria—Contract will soon be let for the white way lighting system so that work can be in early next spring. Andrew Jacobsen and John Griebler, committee.

Minn., Aurora—Council will employ a consulting engineer to determine the cheapest proposition relative to the water and light plant problem, whether to increase the municipal plant or buy power from the St. Louis Power Co.

Minn., Bertha—Council is considering giving the Bottemiller Co., a franchise for electric lights.

Minn., Herman—H. B. Johnson and others are organizing the Macsville Telephone Co.

Minn., International Falls—A new line is projected by the International Falls Telephone Co., C. B. Kinney, manager; the line will be built out of this city by way of Littlefork toward Deer River. Will be equipped with standard poles and six-pin cross arms, capable of carrying a complete copper circuit. The new line to Virginia will be constructed as soon as arrangements can be made with the Canadian Pacific railroad.

Minn., Kerkhoven—Council made an agreement with the Kerkhoven Roller Mill Co. whereby the latter will install an electric light and power plant and furnish the city with lights.

N. D., Linton—Agitation has started for electric lights.

Minn., Milan—A movement is on foot for the establishment of an electric light plant here.

Minn., Mildred—Farmers' Telephone Co. organized by Albert Eastvold and others and lines will be built in every direction and have already connected with the Pine River system.

Minn., Virginia—Bids received by J. W. Murphy, secretary of water and light commission, 8 p. m., Dec. 15, for furnishing of all labor tools and material for completion of the following work for the partial covering of 1,101 feet of a steam line running from the power plant of the city of Virginia to the power plant of the Virginia & Rainey Lake Co., said galvanized iron covering to be of No. 24 gauge galvanized iron; check for 20 per cent. Bids will be received at same time and place for erection of 14 poles and stringing of 5,220 No. 4 wire cross arms, pins, insulators and connection made with switchboards and transformer. Check for 20 per cent. Separate bids on each of the above.

Minn., Virginia—Extensive improvements will be made in the service of the Mesaba Telephone Co. at the local exchange. Fred E. Lister, superintendent.

Minn., Virginia—The car barns of the Mesaba Electric Co. will be rebuilt at once. Henry S. Newton, local manager. The five cars burned will be replaced.

Minn., Virginia—It is reported that the Mesaba Telephone Co., will erect a modern office building here.

Minn., Winnebago City—R. B. Whiteacre & Co., St. Paul, awarded contract to furnish boiler for power house at \$1,178.

Mont., Helena—The matter of the construction of an interurban between Helena and Hausler Lake is being discussed by the Commercial club.

Mont., Musselshell—C. B. Wallace is rebuilding the Hawk Creek telephone lines.

Mont., Three Forks—Cluster lights will be installed on the business street. Write president of council.

CONTRACTS AWARDED.

Iowa, Bagley—Contract for electric light plant let to the Globe Electric Co., Milwaukee, Wis., at \$5,325.

Minn., Crosby—Electric Engineering Co., Minneapolis, received contract to furnish standards for the white way light system. Blake Electric Co., for placing and wiring the standards.

N. D., Douglass—The Douglass Telephone Co. let contract for the construction of nine miles of new line into the Blue Hills to connect with the Garrison line.

HOTELS AND HOSPITALS

Notes Arranged Alphabetically by States.

B. C., Vancouver—Bids will probably soon be asked for on a hotel to cost from \$135,000 to \$200,000; H. B. Watson, city, architect, has completed the preliminary plans; to be of concrete, faced with terra cotta.

B. C., Vancouver—Bids received by R. C. Desrochers, secretary department of public works, Ottawa, Ont., until 4 p. m., Dec. 29, for an immigration detention hospital; check for 10 per cent.

Idaho, Hailey—Cliff Sea, superintendent of construction of the Hiawatha hotel, hopes to make the brick for the building, using cement and sand; he states that the cost of these bricks in the wall will not exceed \$15 per thousand, while brick from Boise, Ogden or Salt Lake would cost at least \$16 to lay down here.

Ida., Reubens—A stock company, headed by Geo. O. Farr, will erect a modern brick hotel.

Ill., Decatur—An addition, eight stories high, is to be erected to the St. Nicholas hotel, to cost \$90,000; Carl Laux, manager.

Iowa, Cedar Rapids—The board of supervisors of Linn county are considering the advisability of buying forty acres near Kenwood on which to build the tubercular hospital; the county will furnish \$5,000 toward the building and the Women's Club the balance.

Iowa, Clinton—Bids for the proposed tuberculosis hospital were rejected, but chiefly because the site is still undecided; the building will be constructed yet. Those who submitted bids were: W. J. Murphy, Ed. Kreiger and J. J. Thompkins.

Iowa, Montrose—A company is being organized to build a hotel here; address the mayor.

Iowa, Pocahontas—It is reported that a stock company is being formed to rebuild the Hotel Pocahontas; address Geo. Schneiders for particulars.

Iowa, Sigourney—A \$25,000 maternity hospital will be built at the Florence Crittenton home.

Kan., Manhattan—Bids received by C. W. Titus, president, Rebekahs, Odd Fellows' Home, about Jan. 1, for a children's building; plans ready about Jan. 1. Two stories and high basement; brick, cement, reinforced concrete floors, tin roof, fireproof partitions, steel stairs, oak and pine finish, structural iron, steam heat, gas and electric fixtures; to cost \$30,000.

Kan., Parsons—Many sites are being considered for the proposed home for the aged to be built by the Woodmen of the World at an approximate cost of \$70,000; secretary of the order, at Parsons, can furnish further information.

Mich., Iron River—A new Boyington house, containing a hundred rooms and costing \$100,000 is to be erected here by Allie T. Wooster, well known Portage capitalist and horse-mah. It will be a 4-story fireproof building of modern construction.

Minn., Brainerd—Fire did about \$5,000 damage to the hospital of the Northern Pacific railway; fully covered by insurance.

Minn., Chisholm—Dr. W. R. Schmidt announces that he will fit up and install a hospital in the Tetzlaff building, which he occupies; this will provide the town with two private hospitals, beside the Rood hospital.

Minn., Chisholm—Bids received by F. C. Lang, village engineer, until 3 p. m., Dec. 10, for the detention hospital; check for 5 per cent.

Minn., Mesaba—A new hotel will be built on the main street here by Frank Heimo.

Minn., St. Paul—Articles of incorporation of the Northwestern Lutheran Hospital Association, which will take charge of the St. John's German Lutheran hospital, Hoffman av. and East 7th st., were filed a few days ago. Thirty-six prominent German Lutherans of the city are organizing the stock company to take the place of the St. Paul Lutheran Hospital Co. The new company will erect a \$50,000 hospital which will accommodate fifty patients. Address Rev. A. C. Haase, one of the incorporators, for further information.

Minn., Two Harbors—Martin & Finn, proprietors of the Commercial hotel, are planning on a basement under the hotel, 47x48.

Mont., Scobey—Tom Courchene, Culbertson, Mont., contemplates building a \$12,000 hotel here.

Nebr., Omaha—Col. S. S. Curtis, owner of the building at 18th and Harney sts., is considering converting the building into a hotel.

N. D., Dunseith—The grand lodge of the Workman order have voted \$4,000 for a new cottage at the tubercle hospital here, to be built next spring; address Dr. J. G. Lamont, in charge.

N. D., Tappen—The Commercial has been destroyed by fire; about three-fourths of the value insured.

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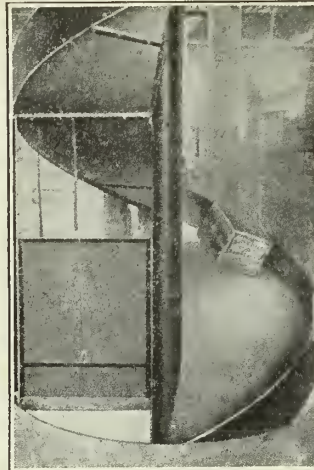
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(Midway)

ST. PAUL

Okla., Ardmore—The Commercial club, oil men and others are planning to organize a company to build a modern fire-proof hotel to cost \$150,000.

Ore., St. Johns—Articles of incorporation for St. Johns Sanatorium Co. have been filed, the purpose being to build a sanatorium; E. P. Sully, chairman of the board of trustees.

S. D., Letcher—W. H. Welch is building an addition to the Letcher hotel.

Texas, Greenville—Proposition to build a county hospital at an expense of \$150,000 was voted down.

Wash., Seattle—The finance committee of the council has authorized the sale of \$125,000 of tuberculosis hospital bonds.

Wis., Menasha—Plans and specifications have been prepared and bids will soon be submitted for a 1-story addition to the Hotel Menasha.

Wis., Rhinelander—Plans for a 3-story hotel are being drawn it is said, by T. Gastra, 701 E. 4th st., Chicago.

Wis., Waupaca—The proposition to build a sanitarium in this county was voted down by the county board.

CONTRACTS AWARDED.

B. C., Nanaimo—Contract has been made with Mesher Bros. for the addition to the Occidental hotel, at about \$5,000.

B. C., Smithers—Contract has been let to L. Schuller for the \$30,000 hotel to be built by the business men at Main and 3d sts.

B. C., Vancouver—Contract has been made with the Bentley Co., city, for the alterations to the Hotel Dunsmuir. The work will be extensive, marble and ceiling work in the lobby, etc.

B. C., Vancouver—Contract for the terra cotta tile to be used for the roof and promenade of the new Vancouver hotel building has been awarded by Skene & Christie, the general contractors, to the Ludowici-Celadon Co., Kansas City, Mo.

B. C., Victoria—Contract has been let to Dinsdale & Malcolm for the alterations and additions to the Gordon saloon, which will be made over into a hotel; W. J. Rowlands is the owner.

Mich., Grand Rapids—Contract for complete construction of the 9-story and basement hotel for the Old National Bank, has been let to Geo. A. Fuller Co., 140 S. Dearborn st., Chicago, Ill., at \$700,000.

Wis., Mendota—Contract has been awarded to the W. S. Patterson Co. for the heating and plumbing in the new building for patients, and the same for the nurses' building.

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

B. C., Revelstoke—Negotiations are pending for the construction of a first class moving picture theater; the site has been purchased from Mr. Lawrence of Lawrence's Hardware Store, city, but names of the promoters are not available.

B. C., Vancouver—Wm. Kilroy and S. F. Morgan have purchased the property occupied by the Maple Leaf theater and plan to add three or four stories to the structure.

Iowa, Clinton—Two Chicago men have been here endeavoring to purchase the Ramsey property with the object of erecting a big moving picture theater on the site.

Iowa, Grundy Center—Chas. Johnston will erect a modern new opera house in the spring.

Iowa, Oelwein—Plans have been prepared by J. T. Burkett, Waterloo, Iowa, for a moving picture theater for A. F. & F. C. Meves; 32x90, one story, frame, plastered; to be done by day work, overseen by the owners; steel sash, steam heat, piped for water, electric light, sheet metal cornice and ceiling, composition roof, common, patent and ornamental plaster, Beaver board, Lowe Bros. varnish, figured and art glass, leaded lights, birch finish, stucco exterior.

Iowa, Remsen—The Knights of Columbus are going ahead with their plans for a new club home and opera house; articles of incorporation will soon be filed and the work will be begun in the early spring.

Kan., Arkansas City—The erection of a new theater building to cost about \$20,000 has been begun by R. C. Howard.

Kan., Leavenworth—Plans for the proposed Masonic temple have been drawn by W. P. Feth, architect and the contract for the building will be let about Jan. 15.

Minn., Lamberton—A new opera house is to be built here by Henry Gumto.

Mo., Bethany—A castle hall in the medical style is being built by the Knights of Pythias; it is of deep red vitrified brick laid in dark mortar, trimmed profusely with Carthage cut stone; the style is of the middle ages, when Knighthood was in flower; the cost will be about \$20,000.

Mont., Livingston—A club house and store building is to be built by the Elks and architect C. H. Turk is receiving

figures; brick, stone, metal skylight, galvanized iron cornice, Berger metal ceiling, metal lath.

Mont., Livingston—Plans and specifications have been approved for the \$50,000 Elks' home; to be 3-story, the ground floor occupied by four store rooms.

Neb., Kearney—A site for the proposed Y. M. C. A. building has been secured on option.

Neb., Seward—A committee has been appointed by the Commercial club to consider somewhat definitely the building of a club home.

Neb., Theedford—A new town hall is to be built by C. T. McMillan and E. H. Hines.

N. D., Fargo—Plans are progressing for the Union Labor temple, which is to be built here.

Ore., Bandon—The local lodge of Moose expect to build a lodge building costing about \$25,000; L. A. Langley, secretary of the building association.

Sask., Bredenburg—The Elite theater has been destroyed by fire, but as the loss was covered by insurance, it may be rebuilt at once.

S. D., Humboldt—Manager *Wiesc* will rebuild his opera house, recently destroyed by fire; it will be 60x80, 2-story and a basement.

Wash., Seattle—Jensen & Von Herberg propose erecting a moving picture theater to cost about \$125,000.

Wis., Birnamwood—A hall and opera house is contemplated by the village, to be built in the spring and to cost about \$10,000; Guy Van Doren, clerk.

Wis., Black River Falls—A company has been organized with a capital of \$15,000 to build an opera house; Robert P. Rainey is one of the incorporators.

Wis., Waukesha—A committee of the local lodge of Elks has been authorized to formulate plans for the organization of a stock company with a capital of \$20,000 for the building of a club house with a bowling alley, pool and billiard hall, and a large dance hall.

CONTRACTS AWARDED.

B. C., Vancouver—Contract for the erection of the structural steel in the new opera house on Pender and Burrard sts., has been let to John S. Glenn, 327 Winch building, city.

B. C., Vancouver—Contract has been let to Campbell & Wilkie, city, for an elaborate moving picture theater for the Rex Amusement Co., W. P. Dewees, president; cost \$40,000; practically everything is let on the building.

Neb., Aurora—Contract has been let to the Mid-West Construction Co., for the theater building to be built by Cass Bros. The building will be 100 feet deep and will be 1-story high; the wiring and electric effects will be left to the lessees, James Schoonover, Charles Wentz and others.

SCHOOLS

Notes Arranged Alphabetically by States.

Alta., Calgary—The Calgary Protestant public school board will erect an administration building.

Alta., Calgary—Seventy-five new rooms will be added to the Calgary school building.

Alta., Calgary—A pre-vocational school will be erected here.

Alta., Edmonton—The board of education of Edmonton, Alberta, has completed its program for new school buildings to accommodate 4,116 additional pupils. The details follow: Ritchie school, 12 rooms; Elm Park temporary school, 2 rooms; King Edward school, 17 rooms; H. A. Gray school, 16 rooms; John A. McDougall school, 17 rooms; Highlands school, 17 rooms. The completion of these buildings will relieve the congestion that has been a marked feature in the schools this year. It is understood that several schools will be erected next year.

Alta., Medicine Hat—J. S. Chuppert, of Kansas City, Mo., has been appointed architect for the city schools.

Alta., Medicine Hat—R. M. Napier, secretary of school board, wants architects and superintendent for erection of a school building.

Ida., Downey—Woodland Ward plan erection of a new school building.

Ida., Whitebird—Fire destroyed school house valued at \$3,000.

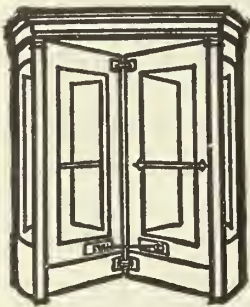
Iowa, Blanchard—Funds are being raised for the erection of a high school gymnasium here.

Iowa, Grand Junction—Plans have been completed by architect Trunk & Heim, St. Joseph, Mo., for erection of school building, approximate cost \$40,000; address board of education or architect.

***Wis., Mauston**—Bids received until 4 p. m., Dec. 29, for brick and stone school; see official advertisement in The Improvement Bulletin this week.

Iowa, Leon—Bids received Dec. 13, 1 p. m., for the erection

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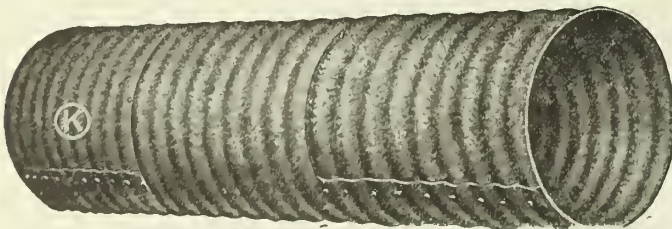
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of a school house in Woodland township. Decatur Co., E. H. Carver, secretary, RFD. 2, Lineville, Iowa.

Man., Swan River—Bids received for the erection of a school house at Fisher Siding Co., No. 1200, by W. Bumby, secretary-treasurer of municipal office, Minnetonka.

Man., Winnipeg—Bids received Jan. 2, for erection of Indian school, at Cross Lake, Man., by Indian office, Winnipeg.

Man., Winnipeg—E. D. Tuttle, architect, 709 McArthur building has prepared plans for a 2-story brick addition to the present school building, fireproof, iron vault, tile, reinforced concrete, fireproofing, lime cut stone, rolling steel shutters, blower steam heat, electric light, metal lath, maple floors, fir finish.

Mich., Bay City—The board of education contemplates erection of a high school; estimated cost \$175,000.

Mich., Chesaning—Plans are started for a 2-room school house, brick, construction, by architect, J. D. Chubb, 822-32 N. Clark st., Chicago, Ill.; owner will take bids.

Minn., Stacy—Bids on general contract for the Stacy high school were received as follows: A. E. Rydlyn, brick, \$6,600, stucco, \$6,100; Hoglund Bros., brick \$6,921, stucco \$6,130; Chas. Hogstrom & Co., brick \$7,070, stucco \$6,042; H. E. Swanson, brick \$7,420, stucco \$6,340; W. H. Jackson, brick \$7,945, stucco \$7,000; heating contract: A. B. Donaldson, \$1,375; Hasey Heating Co., \$1,491; Bjorkman Bros., \$1,735; E. A. Lamb, \$1,844; J. P. Adamson Co., \$1,987; all bids were rejected at a recent meeting held Dec. 1, project will be dropped for the present. H. Edward Walker, architect, 202 Lumber Exchange building.

Mont., Clara—Bids received until 4 p. m., Dec. 6, for building of a school house in district No. 21; check for 10 per cent; A. F. Elliott, clerk, district No. 21.

Mont., Huntley—Bids received Dec. 8, for erection of a frame school house, 34x20, on S. W. corner section 26, district No. 10, plans on file at office of the Chase Lumber Yard, Huntley; H. S. Quanbeck, chairman.

Mont., Manhattan—Plans are being prepared by Fred Wilson, architect, Bozeman, for erection of school house; estimated cost \$25,000.

Mont., Plentywood—T. R. Aiton & Son of Alexandria, Minn. have contract for erection of a large school house.

Mont., Waldheim—Bids will be received until Dec. 8, for erection of a school building for district No. 11.

Mont., White Sulphur Springs—Work has commenced on the brick school house, Jas. Smith, of Lewistown, contractor for brick work; Blessing & Edwards, general contractors.

Neb., Fairmont—Grafton school district voted \$20,000 bonds.

Neb., Laurel—\$20,000 school bonds were voted.

Neb., Neligh—A new school house will be erected in district No. 93, near Orchard.

Neb., Stapleton—Contract for letting of school contract has not been awarded as yet, postponed for 10 days; address secretary of school board.

Ore., Eugene—\$175,000 bonds were voted for erection of new buildings at the university of Oregon.

Ore., Eugene—School board favors issuance of \$100,000 high school bonds.

Ore., Portland—At special meeting it was decided to purchase 16-acres of land adjacent to Creston school for site for proposed agricultural school.

Sask., Wadena—Work has started on the new \$39,000 school.

Wash., Camas—\$29,000 school bonds were sold for school house in district No. 58; Fred Barnes, clerk.

Wash., Palouse—At a special election school district No. 179 decided to issue \$1,500 bonds; construction work to begin at once.

Wash., Walla Walla—Plans are being prepared by architect Henry Osterman for erection of proposed new high school.

Wis., Kingston—A 2-story and basement school building will be erected 45x65, plans in progress by architects, Anderson & Williams, Wilner building, Green Bay; H. Volkman, will take bids; cost \$8,000.

Wis., Madison—Plans are being rapidly put into shape for the construction of the \$60,000 Soils building. A. R. Whitson, chairman.

Wis., Menomonie—Ground has been broken for the new Clark dormitory, brick, 2-story and basement, 26-foot front; seating capacity 100.

Wis., Rochester—The county board voted \$10,000 for the training school at this place; making a total of \$45,000.

CONTRACTS AWARDED.

B. C., Grindred—Contracts for two schools one here and one at White Rock, were awarded to Donham & Gildemeister, and Croy & Wishart.

B. C., Mission City—Contract awarded to Catherwood & Slask of Mission City for the erection of a 2-room school building at this place, at \$7,500.

B. C., Victoria—Contract awarded to Donham & Gildemeister for the erection of Grinrod school; contract let for White Rock school to Croy & Wishart.

Iowa, Esterville—James Cox, recently closed contract for a \$25,000 high school at Livermore.

Iowa, Lamoni—General contract awarded to F. S. White, Eldora, Ill., for the erection of high school building; cost \$40,000.

Mont., Dillon—Contract was awarded to F. D. Knotts, for the painting of the new high school, at \$9,375; contract awarded to Jardine Rife for electric wiring, at \$973; other bids were; the Capital Electric Co. of Salt Lake City; the Butte Electric Co., of Butte.

Mont., Glendive—Contract awarded to Bell & Frandzen, of Savage, Mont., for a 2-story school house, in district No. 4, at \$41,300; other bids were: Bismarck Construction Co., Bismarck, N. D., at \$43,750; M. O'Brien & Co., Minneapolis, at \$43,843; Cleaman & Co., Miles City, Mont., at \$46,900; Piper Construction Co. Billings Mont. at \$42,949; Gagnon & Co., Billings, Mont., at \$43,956; Frank Ferguson, Sheridan, Wyo., at \$47,398. B. Rivenes, architect, Miles City, Mont.

Neb., Dwight—A high school general contract let to W. R. Shankland, Lincoln, Neb., architect, J. H. Craddock, 3d floor, Continental Bank building, Omaha.

Ore., Bend—Contract awarded to Brasterhouse, Bend, Ore., for construction of school building in district No. 12; plumbing awarded to Jas. J. Ryan, Bend, Ore., at \$2,450; for heating to McPherson & Co., Portland, Ore., at \$2,450.

S. D., Parkston—Contract awarded to the Schlitz Construction Co., Emery, S. D., for the construction of a 2-story school house here; plumbing contract to Goetz Construction Co., Yankton, S. D.; heating, to Benj. E. Cowles, Sioux Falls, S. D. Architect Goetz prepared plans.

S. D., Vital—Anton Tsiska has contract for erection of school building.

Wis., Fond du Lac—Contract for the new West Side high school will be awarded in December.

Wis., Milwaukee—The common council has awarded contract for the steel work on high school building to Northwestern Bridge & Iron Co., Milwaukee, at \$5,450.

NEW FIRMS INCORPORATED

Iowa, Keokuk—The Tabor Co., capital \$50,000, B. C. Tabor, president, will deal in building material.

Iowa, Marshalltown—Iowa Fruit Co. incorporated; Robt. McCreery and others.

Iowa, Waterloo—Goss-Brebner Co., capital \$10,000, J. T. Goss and G. E. Brebner.

Minn., Duluth—Cuyuna Central Iron Co., capital \$300,000; Wm. Peck, John Nolan and others.

Minn., Duluth—Bankers Trust Co., capital \$20,000; A. L. Ordean, Thos. J. Davis and others.

Minn., Duluth—Comstock Lumber Co., capital \$50,000; J. W. Comstock and others.

Minn., Duluth—Thompson Realty Co., Wm. F. Thompson and others.

Minn., Duluth—E. G. Kreidler and M. J. Doyle incorporated the Kreidler-Doyle Co., capital \$25,000.

Minn., Glyndon—Glyndon Light & Power Co., capital \$10,000; A. J. Fitzsimmons, president.

Minn., Minneapolis—Frank Hirshfield & Co., capital \$50,000 Frank Hirshfield and others.

Wis., Rhinelander—Consolidated Produce Co., capital \$15,000, M. H. Helgerman.

GARAGES AND BARNs

Notes Arranged Alphabetically by States.

Iowa, Dolliver—Isaac Coleman is putting in foundation for a new barn.

Iowa, Kingston—Fire destroyed the barn of Mr. Russell; loss about \$10,000; insured at \$5,000.

Iowa, Merville—Contract awarded to J. A. Huxtable, of Le Mars, for erection of the Merville Auto Mart Co. garage.

Iowa, Randolph—C. R. Clark agency for the Ford Automobile, will erect a modern garage.

Iowa, Rockville—John Johnson is building a garage, modern, 40x60, work started.

Minn., Barnesville—Proposition is being agitated for erection of another story to the Comstock garage.

Minn., Bemidji—Charles Jewett has purchased the Auto garage of John Moberg and will remodel same, making it an up-to-date garage, steam heat will be installed.

Minn., Eagle Lake—Alfred Evavold is erecting a large barn.

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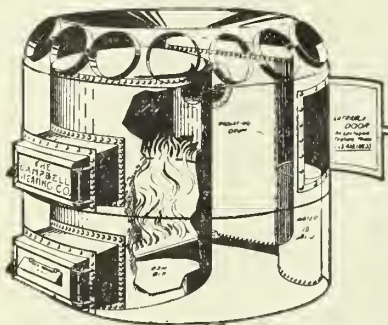
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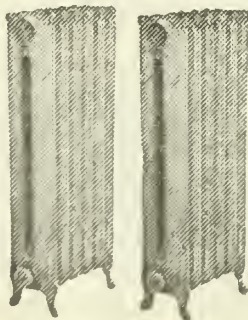
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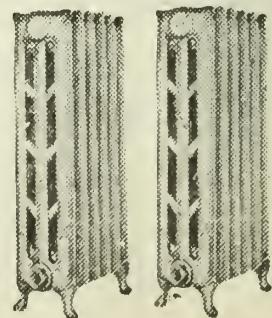
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BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Minn., Bejou—The American State Bank will build a new bank building.

Minn., Chisholm—Fire destroyed the dry goods store of Jasper-Fjeldstad; loss estimated at \$8,000.

Minn., Duluth—Plans are being prepared for erection of a new brick building adjoining the Albenberg building, approximate cost \$25,000; 2-story and basement.

Minn., Faribault—Fire destroyed the business block of the Stocklein Co.

Minn., Luverne—Fire destroyed the implement building of H. F. Bierkamp, at Durant, Iowa.

Minn., Milaca—Fire destroyed the business block, including the Conger house, Milaca house, Wyan's saloon, Sleight's store, Barrett Campbell & Co., hotel, drug store and post-office; loss estimated at \$15,000.

Minn., Milaca—Mr. Chatburn will soon erect a brick business building.

Minn., Milan—B. R. Broadland & Son are building an addition to H. H. Halderson's restaurant.

Minn., Minneota—P. P. Jokull and crew have begun work on the Tilleman State Bank.

Minn., Pipestone—Basement walls have been completed for the Frazer Mackay building.

Minn., Sauk Rapids—G. L. Johnson, Mora, Minn., has formed the Johnson Hardware Co., and a building will be erected here for the handling of all kinds of farm implements.

Minn., Wadena—A new bank building will be erected at Ironton.

Mont., Fairview—Work has commenced on the warehouse of Johnsgaard & Foess Co.

Mont., Glasgow—Mrs. Marq Sylte, Williston, N. D., will erect a building the first floor will be occupied by a store and the second for offices.

Mont., Great Falls—Lee M. Ford, president of the Great Falls National Bank and his brother S. S. Ford will erect a 5-story, 100x125, steel, reinforced concrete, outer walls brick and terra cotta, the ground floor will be occupied by the bank and the upper floors will be fitted up for offices. Plans will be out in a couple of months and the building completed in about a year.

Mont., Huntley—Pickens Bros. have started excavations for an addition to their store building, 50x75 and basement under the whole store.

Neb., Auburn—Stout & Andrews will erect a cement block building, 25x40.

Neb., Beaver City—Work has commenced on the new blacksmith shop for Walter Frederic, 24x80, cement block construction, and also a machine shop and garage by Foss & Elder.

Neb., Carleton—J. F. Garey will build a feed store building.

Neb., Curtiss—Fire starting in the Besserman meat market burned the telephone exchange building, the jewelry store of S. R. Razee. New brick buildings will be erected on the sites.

Neb., Fairbury—The brick work on addition to the Farmers' & Merchants State Bank is completed.

Neb., Fremont—Foundation for the brick building of A. Bordy, is being laid.

Neb., Lincoln—The Nebraska Material Co. will build a 2-story building, 50x142, fireproof, reinforced concrete, estimated cost \$30,000.

Neb., Lincoln—The Herpolsheimer Department Store will be enlarged by an addition of a 40-foot front, this is a preliminary to the remodeling of the entire store and increasing the size to a 4-story.

Neb., Omaha—The National Printing Co. is planning a new 6-story building.

N. D., Brinsmade—Fire destroyed the pool hall of Mr. Jacobson and the Robonson barber shop; loss about \$5,000.

N. D., Rolette—Fire destroyed the pool room of F. H. Koontz.

N. D., Tappen—The Woessner Mercantile Co. was burned out.

N. D., Tokio—Store building owned by D. R. Chase and occupied by the Chase hardware and J. R. Halsam, general store was burned; loss \$3,000.

N. D., Westby—E. C. Patterson is making preparations for erection of a printing office, 24x30.

Sask., Moose Jaw—Fire destroyed one of the cold storage departments in Gordon Ironside & Fares, abattoir and meat packing plant, approximate loss, \$100,000; preparations are being made to rebuild.

S. D., Garden City—Fire destroyed the business block here, including, Janet, White & Knapps, implement house, Greg-

ory's barber shop, restaurant, Warwick's harness shop and others.

S. D., Garden City—The business section of this town was burned, causing a loss of \$17,000.

S. D., Volin—Fire destroyed the new store building of Henry Volin.

Wash., Centralia—G. L. Ingraham will erect a 2-story brick and modern throughout; cost \$12,000.

Wash., Puyallup—The 1-story frame building destroyed by fire owned by James Stevenson, will be rebuilt with a modern 2-story store and office building, brick and tile construction; cost about \$10,000.

Wis., Beloit—Fire destroyed the millinery shop of Mrs. Katherine Hamilton and photograph studio of W. C. Larson; loss estimated at \$5,000.

Wis., Hurley—The Wakefield Mining Co. will erect an office building; cost about \$6,000. Contract let to Fred Hawn, work to start at once.

Wis., Milwaukee—Building of the Ford Automobile Distributing Agency burned, causing a loss of \$125,000.

Wis., Racine—N. O. & S. O. Krough Co. will erect a new store building, to be under firm name of Krough Bros. Dry Goods Co.

Wis., Rice Lake—Deb Knight, proprietor of Reliable blacksmith shop and F. J. Krenz of Palace meat market, will rebuild buildings recently burned; brick and cement block construction.

Wis., Spooner—Chas. Price will rebuild at once, building destroyed by fire.

Wis., Viroqua—Fire damaged the Charles Ostrom general store; loss estimated at \$18,000.

Wis., Wheeler—Frank Bailey will erect a business building in the spring.

CONTRACTS AWARDED.

Iowa, Burlington—The Ewinger-Lee Farm Implement Co. are erecting a 2-story brick, 117x32, Henry Beck, contractor.

Iowa, Des Moines—Plans are completed for the new 12-story building to be erected by the Register & Leader, located on 8th and 7th st., Proudfoot & Bird, architects.

Iowa, Lamont—H. C. Ehrke, contractor, has contract for a business block for Geo. Guy, 33x100; and an addition to the National hotel, 2-story, 32x60.

Mich., Bessemer—The contract was awarded to Fred Hawn of Hurley for the construction of a \$6,000 office building for the Wakefield Mining Co.

Minn., Calumet—Contract awarded to S. W. Mayberry of Clarksville, Tenn., for the erection of a large chimney for the Arthur Iron Co.

Minn., Silver Lake—C. S. Vojta will erect a new warehouse and garage, 60x100. Plans drawn by Keith Architectural Co., of Minneapolis, contract for erection let to C. M. Steenberg, St. Paul, Minn.

Mont., Judith Gap—J. A. Nickel awarded contract for his new building to W. T. Sharpe, cost \$2,000.

Neb., Omaha—E. O. Hamilton, local Contractor, has been awarded contract for business block at 19th and Farnam st. by Harrison & Morton, agents, for Dr. Harold Gifford; cost \$30,000.

Neb., Silver Creek—Contract was awarded to H. Woerth of Columbus, for erection of the Farmers' State Bank building; C. B. Powers got the contract for cement work.

Wis., Beaver Dam—Huter Construction Co., Fond du Lac, have begun work on the 2-story brick for Wm. Geitman.

Wis., Milwaukee—Contract for Mutual Breweries Co.'s building let to Wm. Grieser, St. Louis; cost \$315,000; P. H. Nolan, manager.

Wis., Rhinlander—Contractor Johnson has resumed work on the Merchants State Bank building.

RAILROADS

Mont., Harlowtown—St. Paul road expected to let contract at once to electrify line from here to Avery, Idaho, 440 miles, at \$7,000,000; later Avery to Cascade mountains.

Mont., Livingston—Fire destroyed the N. P. warehouse.

Mont., Roundup—Carpenter Creek railway incorporated, to build from Japan station to coal mines, Carpenter Creek, capital \$50,000; directors: C. M. Jacobs, Byron C. Jacobs, Vincent McCleary; headquarters, Musselshell.

Mont., Sheridan—Surveyors completed main line of the Butte, Wisdom & Pacific, from Divide to Jackson; through Big Hole country; station site located at Jackson; surveys for three tunnels in four miles, between Divide and Dewey.

Neb., Nebraska City—Towns of Brock and Glenwood, Nemaha county, demand new stations; Glenrock station burned.

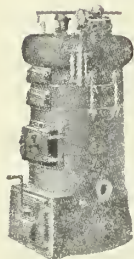
Neb., Superior—Burlington will build a new station and increase its yard.

S. D., Chamberlin—Milwaukee road will probably build an 8-stall roundhouse, concrete.

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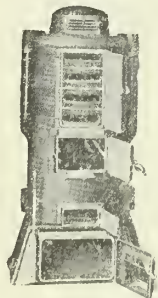
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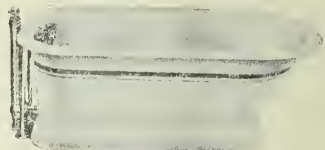
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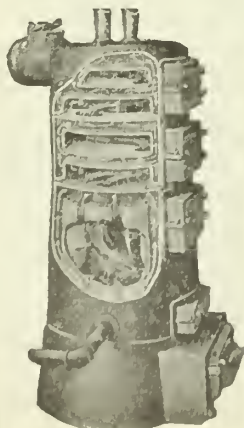
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MILLS AND FACTORIES

Notes Arranged Alphabetically by States.

Alta., Calgary—Lake of the Woods Milling Co. will erect a warehouse, elevator and mills here.

Iowa, Atlantic—The Atlantic Canning Co. will rebuild at once.

Iowa, Birmingham—Bailey & Filson are erecting a building to manufacture builders' supplies.

Iowa, Birmingham—Bailey & Filson are erecting a building to manufacture builders' supplies.

Iowa, Burlington—Plans for the new building of the Iowa Biscuit Co., are in the hands of contractors and bids will soon be submitted. Plans call for 5-story, 54x116, basement 80 feet high, concrete, electric lights, hardwood interior finish, mill work, new ovens boilers, rest room, lunch room, shower baths, etc.

Iowa, Burlington—Burlington Separator Co. incorporated by W. O. Ewinger, J. H. Jacoby and others, capital \$20,000; the factory will be located here.

Iowa, Fort Dodge—Jas. G. Emery representing the International Meter Co. of Webster City is looking up a site here for the erection of a meter factory.

Iowa, Leon—Gene Kentner, manager of the P. B. Walker ice cream factory will erect an ice making factory.

Iowa, Mason City—A second story will be added to the plant of the American Steam Laundry.

Iowa, Mount Ayr—The Iowa Gate Co., of Cedar Falls, has completed plans for a new factory building, covering 20,000 square feet of ground.

Iowa, Oakville—W. H. Smith of Marshalltown will establish a button factory here if the Commercial club will furnish a site and building.

Iowa, Perry—W. C. Donelson of Firm of Donelson & Therkeld was in city with view of locating a factory here.

Iowa, Red Oak—Blue & Rafferty will erect an addition to their factory.

Minn., Minneapolis—The United States Register Co., Battle Creek, Mich., whose Minneapolis branch is at 104 2d st. N., will erect a factory at 2109 Cedar av. R. Rodman, local manager. The Standard Baking Co., organized with a capital of \$45,000, by Harry E. Deimer and R. G. Cargill and others will establish an ice cream cone factory at 242 1st av. S. The American Sectional Furniture Co. will erect a factory at 15th and Quincy, 3-story, brick, 80x128; C. W. Lundquist, builder.

Minn., Minneapolis—A factory will be built at 200 3d av. N. by the Sonorus Co., of Buffton, Ind., for the manufacture of piano players, arrangement conducted by Alex Caswell, Civic and Commerce association, with R. K. Settergren.

Minn., Winona—The Bay State Mills are considering the enlargement of the local plant, 500,000-bushel capacity.

Minn., Winona—Winona Ice Cream & Butter Co. will enlarge their plant.

Mont., Great Falls—Lease & Richards have contract for erection of additions to the American Brewing Co.'s plant; cost \$100,000; work to begin at once.

Neb., Omaha—The People's Ice & Cold Storage Co. will erect a 2-story brick building, fireproof gravel roof. Plans will be out Dec. 5.

Neb., Tecumseh—C. W. Graff and Al. Russell will erect a building for the manufacture of ice cream, cold storage and ice making plant; cost \$10,000.

N. D., Hebron—The Hebron Brick Co. plan to establish a briquetting plant here soon.

N. D., Krem—The Knife River Lumber & Grain Co. let contract to L. Buege of Minneapolis for their mill and elevator.

N. D., Lisbon—A canning factory will be erected here by Sheyenne Valley Canning & Pickling Co. For further information address Commercial club.

Wash., Tacoma—Savage-Scofield Construction Co. will rebuild their plant, new office building, warehouse, wharf and gravel bunkers.

Wash., Tacoma—The Gramm-Bernstein Motor Truck Co. of Lima, Ohio, will within the next six months or year, establish a factory here, for the assembling of parts of motor trucks which will employ from 75 to 100 men.

Wis., Eagle River—T. A. Brenner and partner are planning to open up their mill, known as the Langill saw mill, here about the first of the year.

Wis., Federal Dam—R. F. LeMire will erect a planing mill here.

Wis., La Crosse—The Sterling Machinery Co. will build an addition to its factory. E. F. Wege, president.

Wis., Madison—A. W. Williams will erect a brick and cement addition to his factory; cost \$5,000.

Wis., Mondovi—Farmers' Co-operative Creamery damaged by fire, causing a loss of \$2,000.

CHURCHES

Notes Arranged Alphabetically by States.

B. C., Vancouver—\$16,000 has been subscribed for the erection of a Synagogue for the Hebrew Religious society, Dr. B. H. Rosengard, rabbi.

Idaho, Hailey—Builders have completed contract for construction of St. Charles' church.

Iowa, Cherokee—The members of the M. E. church have completed plans for erection of a church building next summer.

Minn., Duluth—Plans are being discussed by the M. E. church association for the erection of a community house.

Mont., Carver—Plans and arrangements were made at a meeting of the board of the Norwegian Church committee, for erection of a church, Aug. Berg, I. Havskjold and Gilbert Gilbertson, directors.

Mont., Forsyth—Bids received Dec. 6, for a church building, 24x34, modern throughout, further information, by writing to Otho Wise, Howard, Mont.

Mont., Three Forks—The Presbyterians are planning to build a new church.

Neb., Ellis—The German Lutheran church will build soon.

Neb., Randolph—Work commenced on the new Catholic church last week.

Neb., Omaha—Geo. Rahn was awarded contract for new St. Paul's Lutheran church at 25th st. and Evans av. W. F. Gernhardt, architect, prepared plans.

Neb., Potter—The Catholics are planning to secure site for the erection of a new church.

N. D., Hansboro—Work has begun on the new Catholic church.

N. D., Jamestown—The M. E. Church association will build a new church, 34x87, foundation in, general contract let to Mernley & Maxwell, Wapello, Ill., architect, Lewis H. Sturges, 527 Board of Trade building, Indianapolis, Ind.; Rev. Jas. Anderson, pastor, Jamestown; superstructure to be built in spring.

Wash., Arden—Plans are under way for the erection of a new M. E. church, Rev. Osborne Addy, pastor.

Wis., Beloit—Father Giovannuoni of the Italian church has started a campaign for the raising of funds to build a new church.

Wis., Green Bay—Work has started on the addition and improvements to the First Presbyterian church, estimated cost \$6,000.

Wis., Mineral Point—A new church building is being erected by the Pleasant View Primitive M. E. Church association, 40x36, cement block construction, white panel faced corners, to be completed about Jan. 1, 1914.

ELEVATORS

Notes Arranged Alphabetically by States.

Minn., Duluth—Capital Elevator Co. will erect an elevator on Rice's Point.

Minn., Duluth—If Canada abolishes the duty on the American wheat, letting Canadian wheat come into the U. S. free of duty, the Capitol Elevator Co. of Duluth will build a large elevator.

Mont., Dillon—Louis Buege, Minneapolis, has contract to erect an elevator here for a newly organized company of which Chas. Phillips and A. L. Stone are directors; work will begin at once.

Mont., Fairview—Frank Stahl has contract to erect the elevator at Cartwright.

Mont., Hobson—A potato warehouse is being erected for L. Stark & Co.

Neb., Halbur—A movement has started to organize a farmers' elevator, headed by W. P. W. Shenkleberg and an elevator will be erected.

Neb., Nebraska City—Work is being pushed on the Bartling elevator which is being erected on the Missouri Pacific right-of-way.

RESIDENCES

Notes Arranged Alphabetically by States.

Iowa, Williamsburg—Workmen are building four new residences in different parts of city for Dan Collingwood, Wm. Thomas, Mrs. Ella Parr, Mrs. Elizabeth James.

Iowa, Sioux City—Plans are being drawn for a \$5,000 residence to be built by F. M. Pelletier on Summit av.



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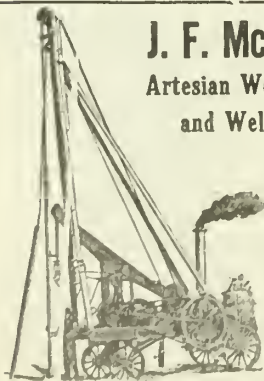
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Iowa, Clinton—The firm of Parker & Johnson will install the plumbing and heating in new residence of Geo. Smith.

Iowa, Ft. Dodge—All bids on new M. E. parsonage were rejected; plans to be altered.

Iowa, Marshalltown—Charles P. Cook will build a modern house next spring.

Mont., Great Falls—Permit was issued to D. R. Niles for a 1-story frame dwelling at 1105 7th av. S.; cost \$2,300.

Minn., Sauk Rapids—John G. Trubant will build a modern residence in the spring.

Mont., Great Falls—Permits were issued to Annie Wolff for a 2-story dwelling, brick at 108 10th alley S., cost \$8,000; Daisy E. Smith, 2-story brick dwelling, \$6,000; S. C. Swartz, two 2-story frame dwellings, cost each \$3,500; Mrs. Iva McFall, 1-story alterations and repairs; cost \$1,000.

Mont., Great Falls—Permit issued to Sarah T. Bodkin to build a 1-story frame dwelling, at 612-14 13th st. N.; cost \$3,900; John Duncan, foundation and excavation, 413-15 2d av. S. at \$2,500; Sexton & Lloyd, excavation and foundation, 3-story, brick, 209-11 st. av. S., \$5,500.

Mont., Saco—E. Ashland and A. H. Schroder are building houses.

Neb., Crookston—Jacob Helmhouse will build a new house near Lake View, S. D.

Neb., Fairbury—Dry Branch Item—Mr. Viette is putting up a new house.

Neb., Fairbury—Frank Warren is building a new residence in Reynolds.

Neb., Grand Island—Walter Rauert will build a residence at once.

Neb., Gretna—Contract let to Ernest Timm for erection of a residence for Peter Glashof. **Grand Rapids**—Gottlieb Dunsnermann has plans for a new residence, to be erected in the spring. **Hampton**—S. Bitticks is laying foundation for erection of a 2-story residence. **Osceola**—Hackberry Item—Robert Nelson is preparing to build a new modern house. **Lincoln**—Permit issued to L. P. Harpham for a dwelling; cost \$2,000. F. B. Harris, dwelling at \$6,500; Mary M. Spear, dwelling \$1,600; John A. Settler, dwelling, \$2,800.

Neb., Omaha—A 2-story, 24x28, residence, will be built by F. L. McCoy, 4334 Lake st. Claude Clandt, contractor, Benson, Neb., modern, frame and stone construction.

Neb., Omaha—Five 1½-story, 22x28, residences will be built by C. G. Carlburg, 310 Brandeis Theater building, siding, brick foundation, shingle roof; cost \$2,250 each; owner taking bids.

Neb., Southerland—Plans completed by Architect Reynolds, North Platte, for a bungalow for F. F. Briggs, work started.

Neb., Sidney—Wm. Gross will build a new residence. **Neb., Nebraska City**—Mr. Rivett went to Syracuse to rebuild buildings destroyed by fire recently. **Kearney**—Contractor Crissley has contract for erection of Dr. C. K. Gibbins' house. **Howell**—Henry Stigge will build a residence. **Henningsford**—Robert Ashford is building a new residence. **Franklin**—R. M. Owen & Shirley Kimberling have completed residence for Dr. C. E. Gross. **Central City**—Contract let to Chadwick Bros. of Central City for construction of modern bungalow for Arthur Wright at Silver Creek. **Bayard**—Dick Howell has started work on residence. **Helvey**—Harry Hartman is erecting a dwelling. **Hebron**—Fred Mitchell is building a new residence. **Norfolk**—B. C. Gentle will build a modern residence. **North Platte**—Mrs. R. C. Langford will build a dwelling in spring. **Plattsmouth**—A 2-story brick bungalow will be erected by Wayne Dickson, modern throughout. A new residence is also being erected for W. E. Rosencrans built of light brick, modern. **Kimball**—W. H. Grosze is building a 5-room cottage. **L. F. Lafferty** is building. **Dr. Swatzlander** of Peetz plans to build a modern residence. **Tobias**—John L. Anderson has contract for new house for John Frankforter. **Tobias**—The M. E. people will build a new parsonage, 26x38, 1-story; cost \$1,500. **Wausa**—G. W. Danielson will build a modern residence. **West Point**—A modern residence is being built by W. T. Fried. **Fairbury**—Wm. Oberhelman is building a cottage, 28x38. **Ainsworth**—The M. E. people will build a modern parsonage.

Neb., Wayne—A. C. Dean plans to build a new house in the spring.

N. D., Aneta—Fire destroyed the Nelson residence.

N. D., Bismarck—Contractor Larson is building two cottages, brick construction and Deputy Auditor Anderson is building a frame cottage.

***N. D., Bowman**—The residence of Ed. Peldhusen was burned.

N. D., Minot—J. C. Woodruff, architect, Minot, N. D., is preparing plans for a \$3,500 bungalow for E. White, owner will buy all material and build same; architect is also drawing plans for a bungalow for Samuel Baydor; cost \$3,000.

N. D., New England—Lawrence Heath is building a modern cottage, 1-story, 30x34, bungalow style, hard pine finish, hardwood floors.

N. D., Taylor—F. L. Hutchinson is building a modern residence, bungalow type, 28x48.

N. D., Williston—Lars Thompson is building a residence. **Ont., Ft. Francis**—The Shevlin-Clarke Co. will erect 15 houses here next spring.

Sask., Saskatoon—G. Whitney is erecting a frame cottage; cost about \$500.

Sask., Saskatoon—John C. Cole will erect a new cottage; cost \$2,000.

Sask., Saskatoon—H. Connolly is erecting a \$1,000 bungalow, frame; cost about \$1,000.

***S. D., Clear Lake**—Messrs. Solem & Storry have commenced the erection of a bungalow, 24x42, modern throughout.

S. D., Flandreau—Work has commenced on J. A. Smith's new residence to be 42x42, 2-story, brick; cost about \$20,000.

S. D., Irene—Contractor Hall is building two new modern residences for Nels Kjergaard and Arthur Olson; Contractor Christianson is erecting a modern house for Hans Hanson.

S. D., Mitchell—Fire destroyed the residence of J. J. Scott.

S. D., Parker—John Dobson has commenced erection of a modern house.

S. D., Sioux Falls—Joyer Johnson is building a modern cottage.

Wash., Algona—Wm. Kemp is building a modern 6-room house.

Wash., Spanaway—A 5-room cottage is being built by Andrew Simons.

Wis., Antigo—The home of C. F. White was burned.

Wis., Bayfield—A new modern residence will be erected by Ed. Baldwin.

Wis., Blue River—Geo. Pippin will build a modern residence.

Wis., Boscobel—Work has started on the new residence of Mr. Squire.

Wis., Chaseburg—Fire destroyed the residence of Otto Schroeder.

Wis., Chilton—Foundation for Dennis Callahan's new house is nearing completion.

Wis., Cross Plains—Faust Bros. began work on residence for Jos. Saeman.

Wis., Eau Claire—A site has been purchased and a parsonage will be erected by the First Presbyterian association.

Wis., Eau Claire—Mrs. Mary Kluempfen is building a modern frame residence, 2-story, heating system, gas, bath.

Wis., Ellsworth—Fred Gifford's house was burned.

Wis., Fond du Lac—H. R. Potter, president of Commercial National Bank, plans to build a modern up-to-date residence.

Wis., Green Bay—Raymond Puddicombe is having Ludolf M. Hansen prepare plans for a new house which he will build in the spring.

Wis., Kenosha—William Randolph Hearst has let contract for erection of a new summer home; to cost several thousands of dollars.

Wis., Ladysmith—Elmer Whitaker, F. M. Whitaker, and Melvin Wilson are building residences.

Wis., Madison—Permit issued to L. W. Atkinson for residence, W. Lawn av.; cost \$5,000; L. F. Schoelkoff, repairs, 641 Wilson st., \$575.

***Wis., Madison**—Geo. W. Bradley has taken permit to build a modern house; cost \$3,500.

Wis., Madison—Permit taken out by Frank Frisch for erection of a bungalow, on Crandall st., to cost \$15,000.

Wis., Madison—Permit issued to W. J. Carter, for residence, Crandall st., cost \$2,400; H. J. Anderson, bungalow, N. Few st., cost \$4,800; O. K. Schubert, flat, Jenifers st., cost \$8,000; Chris Sprecher, residence, E. Gorham st., cost \$5,200.

Wis., Madison—A 3-story modern residence is being built by C. B. Spracher, 1045 Williams st., 25x36; cost \$5,000; clapboards, shingle, excavating. General contract let to Newell Bros., who will take bids on painting and electric work. Architect Aug. Schween, 1315 Spreight st.

Wis., Maiden Rock—Fire destroyed the home of Thomas Todd; loss estimated at between \$2,500 and \$3,000.

Wis., Merrill—Fire damaged the home of Chris Slocum.

Wis., Oconto—Fire damaged the home of Herman Rosenfelt, to extent of \$650.

Wis., Peshtigo—Fire destroyed the house of Chauncey Holcomb.

Wis., Rudolph—Nick Ratelle will build a modern house.

Wis., Sheboygan—Herman Riindfleisch is having a two-flat building erected at corner of N. 4th st. and Superior av.

Wis., Sun Prairie—Jesse Uphoff is building a new residence.

Wis., Superior—Permit was issued for the erection of a \$3,000 residence by A. McKenzie.

Wis., Superior—Building permits were granted to R. W. Runion, contractor for erection of a residence at 1004 N. 21st av., at \$3,100; also to I. L. Ponich, at 415 Baxter av.; cost \$2,000.

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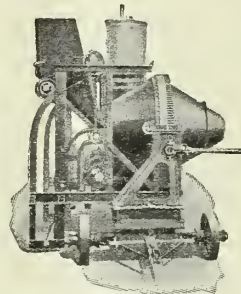
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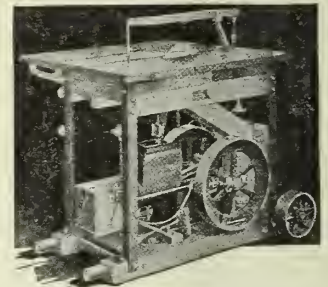
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MINNEAPOLIS, MINN.

METAL ROOFING AS A PROTECTION AGAINST LIGHTNING.

By Prof. E. S. Keene, North Dakota Agricultural College, Fargo, North Dakota.

Protection from lightning is a subject that recurs with the coming of each springtime. In the violence of an atmospheric electric disturbance, accompanied by the awe-inspiring flashes of lightning so common with the thunderstorms of the northwest, there are few who have not desired the protection of a lightning-proof shelter.

The probability of an individual building being struck by lightning is really very slight, but there is always a possibility of such an occurrence, and also that the stroke may be attended with considerable violence; more than that, the building may take fire.

That lightning rods are a real protection to buildings from lightning has been proven so many times that their value is no longer questioned, but the possibility of obtaining experimental data is so limited that definite rules for the establishment of the rods and conductors have never been formulated. For many years lightning rods were looked upon with suspicion in this country, because their sale for a considerable period was used as a means to defraud the unwary.

The formation of lightning is very imperfectly understood, but experience with its vagaries and a knowledge of the laws of high tension electric currents has established a fairly good understanding of the methods of constructing lightning conductors for all ordinary discharges. It is very well known that lightning is the discharge of a large amount of electricity in a very short space of time and that whatever affords it a passage to the earth is apt to be badly damaged, unless the vehicle happens to be a good conductor of electricity and of sufficient size to transmit the amount of electric energy the flash contains; in which case it passes away doing no damage at all.

As a storm develops the electrically charged clouds pass over the earth, and when the electrical intensity becomes great enough to break down the resistance of the intervening air, the resulting discharge will pass into the earth by the most convenient path. This is commonly some high object of the landscape, a building, a pole, a tree or any other object that extends up from the earth. If the object is a conductor of electricity and connected with the earth, the lightning will pass into the ground without the least damage being done, but if it is not a good conductor, the havoc that is wrought in an instant is sometimes appalling.

Buildings with metallic roofs that are properly connected with the earth are far better protectors from lightning than could be given by rods. Buildings that are completely covered with sheet metal and well connected with the earth are practically lightning proof. Covered in this manner, buildings have been known to be repeatedly struck by lightning without the least damage. The sheet iron granary, so common in the West, when well connected with the earth may be considered lightning proof. The ground connections mentioned above may be made of metallic rods that extend well into the earth and are securely fastened to the metallic covering of the buildings.

If, then, the roof of a building possesses a metallic ridge, eave-troughs and downspouts, these will afford very good protection if they are well connected and well grounded. A roof covered with a metallic screen, as a chicken screen, makes an excellent protector when properly grounded.

It must be remembered that the ground connection is a positive necessity, and too much care cannot be exercised in its construction. The earth is the great reservoir of electrical energy and it is always at zero potential. If a discharge of lightning can be directed into the moist earth by a conductor, its energy is soon dissipated, but the ground connection must be of considerable area and extend well into the moist earth. A piece of galvanized iron pipe, driven into the ground seven or eight feet, makes a good "ground." Large buildings must have two or more such "grounds." The connecting wires must be securely fastened to the ground connections.

In the matter of conducting wires, the United States weather bureau, in a bulletin on "Lightning and Lightning Protection," recommends a No. 3 galvanized iron wire (Brown & Sharp gauge) as amply sufficient in size for ordinary lightning protection. If metallic downspouts are used as conductors the connections should be made, with the "grounds," with riveted joints. Copper conductors give no better protection than iron if the iron is kept covered to prevent it from rusting.

Wire fences are often the cause of damage by lightning because of the method of construction. If the fence wires are grounded the danger from this cause will disappear. Ground wires may be made of ordinary fence wire and should be connected with each of the wires of the fence and extend into the ground three feet. Such "grounds" should be made for each 100 feet of fence.—The Sheet Metal Shop.

RECENT LEGAL DECISIONS.

EMPLOYER'S LIABILITY—PROXIMATE CAUSE.

In the case of Marietta Glass Manufacturing Co. vs. Pruitt, decided by the supreme court of Indiana, it appeared that the appellee as an employe of the appellant was attempting to adjust a gauge to an unguarded ripsaw while it was in motion, which was the known practice of the factory. The gauge struck so that it did not move freely, and without the request or knowledge of the appellee, a fellow employe struck the gauge with a timber to help to move it. The timber became caught on the saw and was thrown against the appellee's head, injuring his jaw and causing him to throw out his left arm, which the saw cut off. The court held, affirming a judgment on a verdict for the appellee, that the unguarded saw was one of the proximate causes of injury.

ARCHITECT'S SUPERINTENDENCY.

The supreme court of Washington held, in the case of Gould et al, vs. McCormick et al., that where a contract with an architect required him to supervise the construction of the building to see that it conformed with the plans and specifications and that the best of materials and workmanship was used, and further provided that he should supervise it to the entire satisfaction of the owner, the contract did not give the owner the option to discharge the architect whenever he was dissatisfied, but only where there was good cause for dissatisfaction, for the reason that where it is doubtful whether a contract give the right to terminate it for good cause or arbitrarily, the former construction should be adopted. The court further held that where an owner breaks his contract with an architect for the superintendence of construction of a building, the measure of damages is the difference between the contract price and the amount it would have cost the architect to complete the work.

PROGRESS ON THE SAN FRANCISCO CIVIC CENTER GROUP.

With the recent arrival of five carloads of structural steel to be used in the construction of the new San Francisco city hall, activity in the work on the civic center has been given a new impetus. The amount of steel already received aggregates 256 tons, and the material is now on the site of the city hall.

The steel is being furnished by the United States Steel Products Co., the contract amounting to \$357,941. This is for 7,400 tons of steel, which, according to the estimates, is the amount that will be required in the erection of the new municipal building.

Excavation and grading on the site have been completed. It is estimated that 30,000 cubic yards of soil was removed for this work. The Contra Costa Construction Co. has the contract for the work, amounting to \$23,950.

The foundation work for the building is more than a third completed, and just as fast as the progress of this will permit the steel work will be put up. The foundation work is being done by the Sound Construction Co., the contract being for \$44,882. The erection of the steel frame is to be done by the Blume Construction Co. at a cost of \$80,000. This averages about \$10.60 to the ton, including the painting of the steel. The contract for the granite work has been let for \$991,313. The company will furnish Raymond granite, a home product.

The work of crushing brick and stone on the site of the old city hall, the materials to be used in the ground-work of the new building, is progressing rapidly. The approximate cost of this is \$30,000. There are 3,000,000 bricks to be cleaned, 10,000 yards of brick to be crushed and 7,200 yards of stone to be crushed before the work is completed.

Contracts will be awarded shortly for the terra cotta and masonry work. It is estimated that this will cost somewhere in the neighborhood of \$110,000.

The Panama-Pacific International Exposition Co., which has charge of the construction of the auditorium on the civic center site, is rushing this undertaking along with all possible speed. The building is to cost \$1,100,000, and it is the intention of the exposition officials to have it completed by 1915 in order that the auditorium may take care of many of the big national and international congresses and conventions which will meet in San Francisco in that year.

The grading and concrete work on the auditorium site is far ahead of the contract time. The work is to cost \$70,000. The first consignment of steel to be used in the structure has arrived. The United States Steel Products Co. is furnishing this for \$164,835. The erection of the steel has been awarded to the Blume Construction Co. for \$39,900.

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MINNEAPOLIS, MINN

PLUMBING, HEATING, AND VENTILATING

Chairman F. R. King, Milwaukee, states that the first draft of the plumbing code, provided for in the plumbing law which was passed at the last session of the Wisconsin legislature is virtually completed. The state board of plumbing examiners is at work on the methods of conducting examinations. The question was asked the attorney general whether an outside plumber, coming into the state to do business, must take out a \$40 license or only a \$10, license. The attorney general held that the last was sufficient.

J. J. Cardwell & Co., Shenandoah, have been doing plumbing work in Burlington stations of Southwestern Iowa.

The Master Plumbers' Benevolent and Sanitary Association of Winona and La Crosse met at Winona, recently and held business and social sessions. Twenty four master plumbers attended including a representation from West Salem and Lewiston.

J. E. Quinn has joined in the plumbing business conducted at Twin Bridges, Mont., by W. J. MacDuffie, and the firm is now MacDuffie & Quinn.

O. A. Thompson has engaged in the plumbing and heating business at Montevideo, Minn.

J. A. Doyle, plumber, Red Wing, Minn., is installing the heating and plumbing in the new rectory of Christ Church and residence of E. S. Hoyt.

Guy G. Gardner, Estherville, Iowa, has become manager of the E. B. Lohr Plumbing & Heating Plant. Mr. Gardner owned the Estherville Telephone System until he sold to the Western Electric of Mason City.

Kellogg, Ida. has been considering a plumbing ordinance and while the plumbing law was under discussion it was stated that it would require \$1,500 bond to secure a license and enter business in Kellogg.

FIRST AND LAST—"THE STEAM TURBINE."

It is now ten years since the first steam turbine engine was installed in the Fisk Street Station of the Commonwealth Edison Co., Chicago. It is a monster in its day, developing 5,000 kilowatts or about 6,700 horse power. An experiment at the time, it turned out to be the beginning of the end of reciprocating engines for large power units. Since then the capacity of the units has been advancing until now steam turbines are in operation, or on order, of a size so tremendous as to be beyond the dreams of engineers a decade ago. For the last year or so the New York Edison Co. has held the record in the size of a single unit, with its great Curtis turbine of 30,000 horse power in the Waterside station. Then this summer the Commonwealth Edison Co. announced that a still larger one had been ordered for its Northwest station—one of 30,000 kilowatts or a trifle over 40,000 h. p. That seemed to be a record likely to stand for some time; but now, only three months later, the Philadelphia Electric Co. comes forward and gently but firmly insists upon holding the record—announcing a colossus, a turbine of 35,000 kilowatts or 46,666 h. p., which will go into a brand new powerhouse adjoining its present main generating station.—Exchange.

CONSERVING MACADAM SURFACES.

Conserving macadam surfaces, the maintenance of which motor traffic was making prohibitive, is being effected in Allegheny county, Pennsylvania, by using them as the base for new brick or asphalt-concrete roads. Mr. J. S. Gillespie, county road commissioner, in addressing the American Road Congress at Detroit, stated that for brick roads the macadam is first scarified and formed to a true cross-section, concrete curbs are built, the sand cushion is placed and the brick are laid, after which the surface is grouted with a mixture of equal parts of sand and cement. In the other class of construction, bituminous concrete is laid directly upon the scarified and leveled surface, of course, and both finished surfaces are rolled. The method is said to be economical and satisfactory.—Engineering Record.

DURABILITY OF THE KEY WEST VIADUCT.

About thirteen miles of concrete viaduct work along the line of the Key West extension of the Florida East Coast railway have just been inspected, which is done annually. According to a report from Mr. W. J. Krome, constructing engineer, this inspection, which includes foundations and piers, and which was made in part by divers, did not reveal any deterioration due to the action of salt water or the

INDUSTRIAL PROGRESS

INDUSTRIAL PROGRESS.

RAND MINE BLASTING BY ELECTRICITY.

For several months past some of the leading gold-mining companies of the Rand have been conducting experiments in electric blasting in order to test the theory that this method will materially assist in minimizing the fine dust from blasting—accepted as the most direct cause of miner's phthisis—which is at present so widespread in connection with the Rand gold-mining industry. One of the largest syndicates has for some time been experimenting in this direction, and more recently the General Mining & Finance Corporation has been conducting similar tests. During the past week or two several stopes were fired with very satisfactory results in the Meyer & Charlton mine, and it is now stated that the management has decided to introduce the electric system throughout the mine. It is hoped to have the electric system of firing so introduced in the mine that blasting will be done by pressing a button on the surface. This insures that the miners will not be forced to inhale the fine dust, and all that is then required is the proper ventilation of the mine before the return of the miners.

The method of electric blasting as daily conducted at the Meyer & Charlton mine during these tests, as witnessed by representatives of the technical staff of the mine department and underground staffs, is thus described in one of the local newspapers:

The holes in a stope on the seventeenth level were detonated successfully by a portable battery placed at the station on Monday. On Tuesday the permanent cable installed on the eighteenth level was used and some eighty shots fired from the switch box on the station. What the visitors saw on Thursday was some forty-eight hand-stopping and thirty machine-stopping holes blasted. For the hand-stopping holes instantaneous fuses and for the machine-drilled holes delay-action fuses were used. The miners themselves made the necessary wire connections between the holes, while the acting manager and mine captain were responsible for the general arrangements. The blast was fired from the permanent switch box installed at the station, the electric current being taken from the main lighting cable. The mine captain was responsible for the final connection and firing of the blast. The result was a great success and proved that all the arrangements had been given careful attention. On Friday seventeen holes were blasted in the shaft electrically. From the foregoing it will be gathered that a very definite step-forward is being successfully taken in a direction which may prove an immensely important factor in improving health conditions underground, for if men can be got out of the mine at the end of the shift before blasting commences the combination of vitiated air and dust can be completely avoided and the most difficult task in the whole health campaign accomplished. How far-reaching the benefits which may ensue when blasting is performed electrically can not be determined until the method has had a longer trial, but it will certainly eliminate such accidents as arise from time to time in lighting up holes and then getting away from the danger zone.

In case the electric tests now being conducted are a pronounced success, as seems likely, this method of blasting will undoubtedly be incorporated in the mine regulations and will go a long way toward minimizing the danger to health at present caused by the fine dust attendant upon the prevailing practice.

SELF-PROPELLING RAILWAY CARS.

The two self-propelling railway cars acquired in England by the Khedive of Egypt have arrived in Alexandria. One car for the Khedive's personal use consists of observation room, a sitting room, a bed room, and usual offices; the other for his staff contains 16 second-class and 30 third-class places and a luggage van. Each car is about 60 feet and is provided with a four-cylinder benzine motor, of 100 horsepower, attached to a dynamo transmitting the electric current to two motors fixed to the axles. The maximum speed of the cars is 40 miles an hour. The interior of both cars is decorated in brown morocco, while the outside is white varnish. Trials are now being conducted under government engineers. The cost of the train was about \$50,000.

HOSPITALS INCREASING FAST.

The rapid increase in the number of tuberculosis hospitals tempts one to say they are rivalling theaters in their multiplying. Reports received by the Improvement Bulletin of projects in various stages of advancement indicate an almost incessant activity for establishing tuberculosis hospitals with public funds. Plans for these buildings are notably numerous in Wisconsin and Minnesota.

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MUNICIPAL IMPROVEMENTS

TO SAVE BY LIGHT REDISTRIBUTION.

Duluth, Minn.—If the report of J. W. Schneider on his survey and inventory of the city's lighting system is accepted and carried out, Duluth will save \$3,014.40 annually on its lighting. Schneider has placed his report in the hands of Mayor Price. Schneider recommends a great number of changes, and as his report is based upon a personal inspection of the whole lighting system, it is probable that practically all of his recommendations will be put into effect. The general nature of his suggestions is that the lighting system be for the accommodation of the public rather than for individuals. His report recommends the discontinuance of incandescent lights in thirty-eight different streets and avenues; calls for installation of incandescents in twenty-two streets and avenues and of gas lamps in twenty-six streets and avenues; and asks that gas be furnished for gas lamps already installed. The inspection showed that light was being wasted in a great many sections of the city, and the report asks for a better distribution of lamps. Some places are well lighted where little light is needed and vice versa.

MOTOR DRIVEN FLUSHER IN CHICAGO.

A five-ton motor truck carrying a flusher and sprinkler is in use in Lincoln Park, Chicago, where it is doing excellent service. It carries 1,200 gallons of water weighing five tons, and is equipped with an Etnyre tank and pump. The weight of truck, tank and equipment is nine tons altogether, and an engine of 28.7 h. p. is used for both furnishing flushing pressure to the water and propelling the vehicle. The power is divided as follows: 15 h. p. for pressure and 13.7 for hauling the nine tons. The car is a four-wheel drive, making it easy to handle on sharp turns.

The device not only keeps the drives clean, but, as it keeps the macadam binder hard, it saves undue wear on the road surface.

An interesting feature of this outfit is that it is used in winter with a snow broom; the tank, etc., being removed and a seven-foot broom and extra engine attached at the front end of the truck. This cleaner makes 300 revolutions a minute and removes the snow very effectively and economically.

HAMBURG STREET-CLEANING MACHINES.

The statement published in the United States that the city of Hamburg has adopted a motor-driven vacuum road-cleaning machine is entirely inaccurate. There is no such device in operation in this city, and at the street cleaning department it is stated that no arrangements have been made for testing or purchasing any such machine. The report probably has arisen from the fact that a Hamburg manufacturer of street-cleaning and washing apparatus is now building an experimental vacuum road cleaner for the account of the neighboring city of Altona. This device will not be ready to leave the factory for several months and the manufacturers themselves are not disposed as yet to make any claims for it. The same manufacturer is offering for sale an electric, motor-driven, rotary, street washer for asphalt surfaces. A year ago the city of Hamburg had tested two such motor sweepers without immediately satisfactory results. While these sweepers were built for use on asphalt surfaces, they were obliged to traverse long distances over stone pavements, and, as first constructed, were so shaken when not on asphalt surfaces as to give unsatisfactory results on the smooth pavements which they were intended to clean. These two machines have been altered to meet the criticisms of the street cleaning department, and, after having been provided with stronger springs, rubber tires, and more powerful batteries, were accepted.

MOTION PICTURES TEACH ILLITERATE VOTERS.

As a result of the new suffrage law, the number of electors in this district, and presumably throughout Italy, has been enormously increased. In the Province of Catania, for example, there were under the old law some 41,000 qualified voters; under the new statute the number leaps to over 140,000. (The electorate in all Italy is stated to have been thus increased from 4,000,000 to 8,000,000 or 9,000,000.) The task of educating the new voters to cast their ballots properly is a heavy one. As a means to this end the moving picture theaters throughout this district have exhibited films showing graphically the procedure to be followed; in addition the representatives of one of the political parties have exposed similar films in local assembly rooms. This means of educating the public has been so favorably received that similar methods for teaching the elements of domestic and personal hygiene and similar subjects are beginning to be discussed by physicians and others.

BUSINESS INFORMATION

In this section will be found information relating to new devices and methods of construction; also mention of late catalogues issued by manufacturers of building materials and equipment.

Any catalog mentioned here can be seen at the office of The Improvement Bulletin, 912 Lumber Exchange, Minneapolis, where a complete file is kept.

The Master Builder is an interesting little monthly published in the interest of better concrete floors. The November number has pictures of many large buildings where the Master Builders' Method has been used and an interesting testimonial from one contractor. The local branch office of the Master Builders Company is at 822 Plymouth building, Minneapolis.

The Engineer and Fireman, published monthly by the Penberthy Press, Detroit, Mich., for fifty cents a year, has many good articles this month. Among them, one on the care and operation of elevators, and the latest installment in the Engineers' Study Course.

Some more pictures of new buildings where Van Guilder Hollow Wall Machines have been used, are given in the Van Guilder Hollow Wall Bulletin No. 7, published by the company at 718 Chamber of Commerce, Rochester, New York.

Expanded Metal Construction is the monthly magazine of the Northwestern Expanded Metal Co., Chicago, Ill. A theater and cathedral are among the buildings where their products have been used lately and pictures of them are shown in the December number. Johnson, Jackson & Cornig are the Minneapolis representatives, Lumber Exchange building.

Concrete Culverts is a good book for the engineer and contractor and may be had free from the Northwestern Expanded Metal Co., Chicago, Ill., on request.

A little bit of poetry appears in the folder of the Sterling Machinery Co., of La Crosse, Wis., describing their concrete mixers. It is pretty good and the rest of the pages are full of solid facts, all about their brick machines and 1914 mixers.

Cement contractors can have the catalog of long handled cement finishing tools made by the Twentieth Century Manufacturing Co., of Chicago Heights, Ill., free on request.

Suggestions for the care of belting and useful tables for the engineer are given in the booklet describing Balata Belting, which is sent out by the Goodyear Tire & Rubber Co., from Akron, Ohio. Directions telling how to find tension, how to find width, how to find plies, etc., are given.

The G. and G. Telescopic Hoist which is often used in the modern flat and apartment building is handled for the Northwest by the Avery Supply Co., Plymouth building, Minneapolis. A circular describing the hoist will be sent free on request.

The Crescent Universal Woodworker is fully described in a circular mailed free on request by the Crescent Machine Co., Leetonia, Ohio. The photograph shows how four men can work on this machine at the same time without interfering with each other.

Good Light is a beautiful little publication gotten out by the Macbeth-Evans Glass Co., of Pittsburgh, Pa. The illustrations show interiors of some of the finest hotels and buildings in the country.

QUESTIONS AND ANSWERS

Mutual benefit between readers of the Improvement Bulletin is sought in this department. If you have a problem to solve or desire information not available otherwise, write the Improvement Bulletin.

HOW TO FIGURE PLASTERING A ROOM.

Norwood, Minn.

Improvement Bulletin.

To settle an argument, how would you figure a room in plastering eight feet ten inches? Would you figure nine feet high? How large an opening can be figured?

Answer—(a) Figure the exact measurements. In this case eight feet, ten inches. (b) All openings can be figured up to one hundred square feet.

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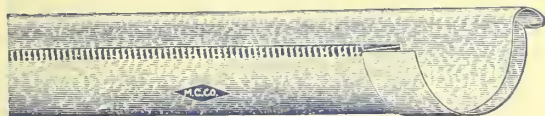
(Each week in this space will appear a letter from different prominent contractors telling of experiences with "Carney's Cement" mortar.)

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"Carney's" is the only cement made at Mankato. The name "Carney's" is on every sack. To avoid Poor Substitutes, LOOK FOR "CARNEY'S."

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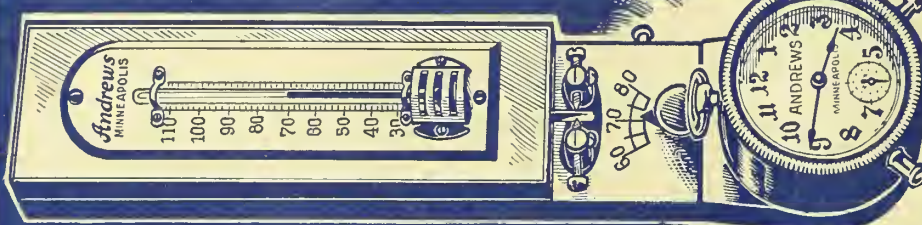
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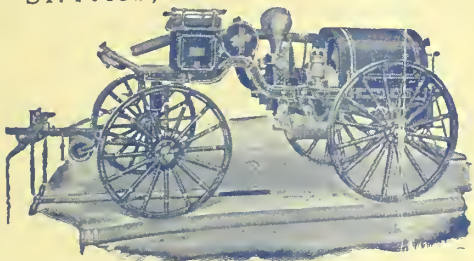
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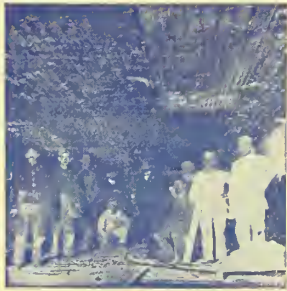
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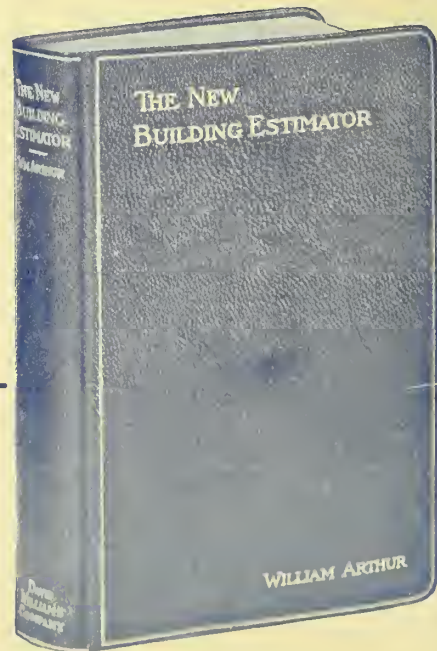
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VOL. XLVII

SATURDAY, DECEMBER 13, 1913.

NO. 2

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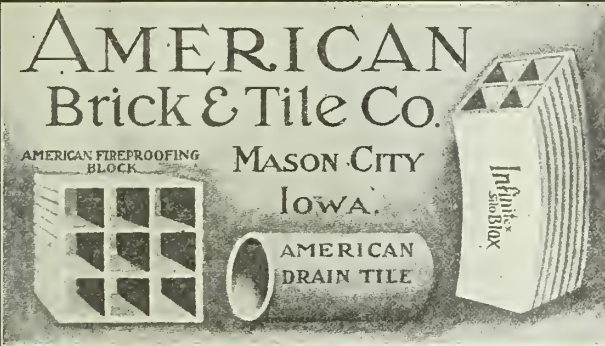
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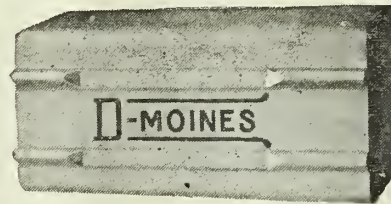
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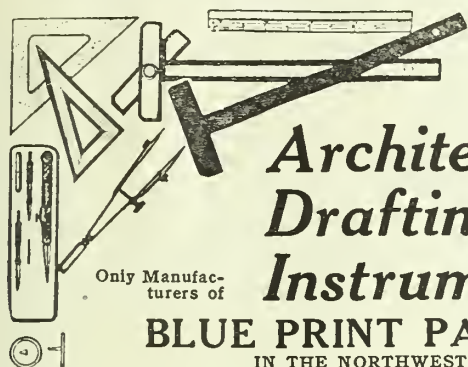
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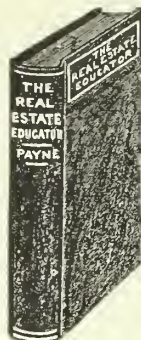
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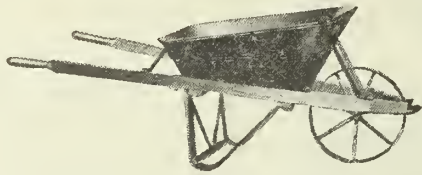
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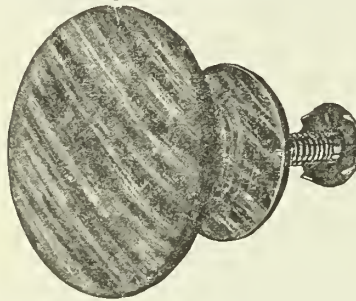
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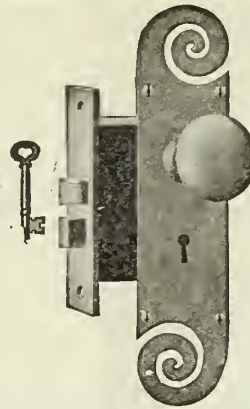
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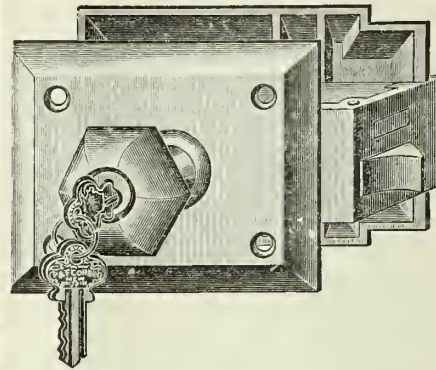
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The IMPROVEMENT BULLETIN

VOLUME XLVII.

SATURDAY, DECEMBER 13, 1913

NUMBER 2

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EDITORIAL



O. L. COLBURN, Editor

MAY BUILD 100 ELEVATORS.

Construction of grain elevators in western Canada will proceed more rapidly than ever in 1914. A check for \$300,000 was received this week at Calgary by the Farmers' Co-operative Elevator Co. Alderman W. J. Tregillus of Calgary is one of the officers. In a statement confirming the receipt of the money from the government, as an annual installment of a promised loan, he said:

"It is a straight business proposition between the farmers and the government. There was no stipulation mentioned and nothing said in regard to the elimination of loans to co-operative schemes, if the elevators should not prove a success. We have now on hand about fifty applications from different points in Alberta, asking us to organize units and build elevators there. We expect to build about 75 to 100 more during the next year and should have at least 150 elevators operating in time for next year's crop."

WISCONSIN AT THE PANAMA EXPOSITION.

In our neighboring commonwealth of La Follette and progress, Wisconsin, active preparations are being made to use the advertising opportunity of the Panama-Pacific Exposition at San Francisco. Having decided to erect a building, a competition for the plans was announced. Meantime the state took up the question of a site on the exposition grounds and by aggressive and prompt work, got one of the best locations.

Architects competing for the prize offered by the Wisconsin Exposition commission for the best design for the state building must be in the hands of D. E. Bowe, secretary of the commission, care of the Merchants' and Manufacturers' association, Milwaukee, not later than Dec. 23. Mr. Bowe then will supply them with copies of the programme governing the contest.

The maximum dimensions of the building will be 50x150 feet. The area of the site is 19,750 square feet, but there must be an open space at least 30 feet wide in front of the building, 18 feet behind and 25 feet on each side.

BETTER CONDITIONS IN STEEL INDUSTRY.

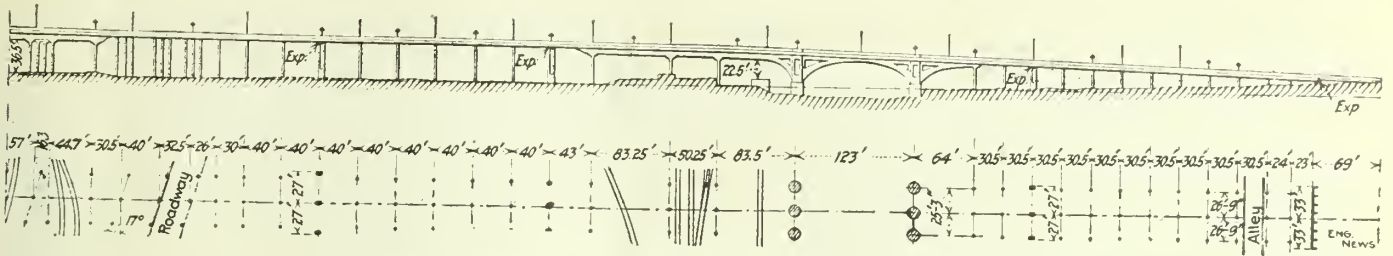
For the first time in some weeks, says Iron Age, several of the larger steel concerns report an increase in inquiry. This has not developed into more actual business, but indicates that the prices ruling are causing consumers to take more interest in the market. It is not believed that any increase in buying will take place this month but, on the other hand, it is likely December will show the low mark in rate of operations. A moderate buying movement is looked for early in January, but it will probably be largely for actual needs.

In structural material, at Chicago, prices rather than tonnage are the matters of interest in the local structural market. The concessions from the basis of 1.30c., Pittsburgh, for plain shapes are magnified into striking irregularities and very low prices for fabricated steel. The Omaha Structural Steel Co. sublet 170 tons of plate girders. It is reported that the general contract for the Missouri state capitol has been let, carrying with it requirements aggregating 5,000 tons of steel. For structural material from mill the ruling quotation continues on the basis of 1.30c., Pittsburgh, but desirable tonnage has brought out competitive prices \$1 a ton lower. In this respect conditions have changed little from those prevailing a week ago. We quote for Chicago delivery from mill 1.43 to 1.48c.

LESS SIMPLICITY IN RAILROAD STATIONS.

A progressive western state has decided through its railroad commission that the box car will hardly do in this progressive day, as a railroad station, not even in cities of 500 inhabitants. It is probable that no one will take exception to this view as indicating restlessness. The use of the box car for a depot, particularly on a great transcontinental railway, is simple, unaffected, democratic; and so for a time it has served. It has been the gateway structure for many a western metropolis of 100 to 500 and more, making its mute appeal against the insidious spirit of luxury tending to moral decay. But pride and courage have made a change. The cities arrived at behind box cars and through them do not believe that they make a good impression and one by one the humble vehicles are being ordered away to make room for better buildings.

In one instance the commission deliberating on the use of a box car at a center of 100 population stated that it did not want to sanction the use of box cars as stations, yet it would not enter an order for a new depot just at that time. However it took action decisively against the use of any old dilapidated discarded car. It must be, said the commission, at least 40 feet long, with ceiling 8 feet high; and it must be well lighted and heated. The box car promulgation of the commission further states that it must have telephone connections, have a caretaker and be open half an hour before the departure of trains. Nothing is said about keeping it open with regard to the arrival of trains, leaving the inference that the average train hardly stops at all, merely hesitates. The order does provide that a key to the car must be kept in some handy place so that merchants can get in, or any one having business such as receiving or shipping freight of express matter. A twinge of the old time simplicity is evinced in the suggestion by the commission that an old station at one point might be used at another. It could be thrown on a flat car, hauled over and deposited.



Lower cut Shows Trackage Arrangement and Footings.

STATE BUILDERS MEET.

The Minnesota State Association of Builders' Exchanges held its annual meeting at the rooms of the Duluth Exchange, 501 to 505 Lyceum building on Wednesday, Dec. 10. Delegates arrived on the 9th and 10th as follows: From Minneapolis—H. M. Gardner, president; John Hoppin; O. E. Deckert; J. L. Robinson; Geo. M. Gillette; E. C. Harrison; Chris. Anderson; M. Theisen, R. L. Cobb; A. L. Berreau; R. L. Karlquist, H. L. Jones, K. F. Lott, J. F. Hurley, Wm. Penn, Wm. O'Brien, H. O. Lenz, A. F. Morse, G. M. Jones, A. M. McGowan, and Eugene Young, secretary, of the Minneapolis Exchange, who is also secretary of the state association. From St. Paul—F. J. Romer, president, F. S. Lammers, A. V. Williams, secretary, H. E. Osgood, J. W. L. Corning, F. M. Cady, J. W. Curtiss. From Stillwater, O. H. Olsen. About 30 members of the Duluth Exchange were also in attendance.

Delegates visited the monster plant of the Minnesota Steel Co., Tuesday afternoon, and were entertained by the Duluth Exchange with an informal dinner at the Holland on

undoubtedly made, and it now remains for a company to organize that can take advantage of the opportunity, and meet the requirements of the situation.

The following officers were elected for the ensuing year: president, H. M. Gardner, Minneapolis; first vice president, F. J. Romer, St. Paul; second vice president, E. J. Zauft, Duluth; third vice president, O. H. Olsen, Stillwater; fourth vice president, W. I. Kingsley, Faribault; fifth vice president, Olaf Swendsen, St. Paul; secretary and treasurer, Eugene Young, Minneapolis. Executive committee: James Leck, Minneapolis; F. J. Nixon, Duluth; J. A. Roberts, St. Paul; Fred Lammers, Stillwater; James O'Neil, Faribault.

President Frank A. Carlson of the Duluth Exchange presided.

NEW HOME OF THE MINNESOTA CLUB, ST. PAUL.

Butler Bros., general contractors, New York Life building, St. Paul, who will build the new club house, 4th and Washington, in place of the old Metropolitan hotel, for the Minne-



The New Minnesota Club, St. Paul, Minn.

their return. The party was then taken to the Orpheum for the evening. At 12:30 p. m., on Wednesday, the local exchange gave a dinner to its members and visitors at the Commercial club, which was interspersed with music, and followed by a short program of speeches.

Business sessions of the association were held at 10:00 a. m. and 2:30 p. m. The subject receiving the most attention, was Employers' Liability under the new Compensation Law, which was introduced by a report from a sub-committee of the executive committee, recommending the formation of a mutual company among builders and other employers, to handle this class of insurance. Two men particularly well qualified to discuss this subject were in attendance. One was Elmer H. Dearth, former insurance commissioner of this state, now managing the Michigan Compensation Mutual Insurance Co., at Detroit, who read a paper, embodying the experience and conclusions of that company, and advising the formation of a similar company in Minnesota; and the other was Geo. M. Gillette, one of the commissioners appointed by this state a few years ago, to study workmen's compensation for two years and report to the legislature. Mr. Gillette is a former member of the state senate, and a large employer of labor, being president of the Minneapolis Steel & Machinery Co. He ably presented both sides of the mutual insurance question, and then gave his reasons for favoring the formation of such a company. Much sentiment in that direction was

sota club will soon award the sub-contracts. The club house will be an unusually handsome structure with every modern improvement, and cost \$250,000. The architect is C. H. Johnston, of St. Paul, who has designed many important local and state structures. The contracts require completion by Dec. 1, 1914. The building will be in the Italian style of architecture. There will be three stories and a basement, with a frontage of 198 feet on Washington st., 104 feet on 4th st. and 74 feet on 3d. The main entrance will be on Washington st. The structure will be of cut stone and brick, with Bedford stone trimmings. A terrace is planned at the 3d st. end of the building, overlooking the river. Facing the terrace will be a large open space which will be used as an outdoor dining room during the summer. A large lounge room, 40x74 will be located on the 4th st. side of the building. On the main floor will also be the main dining room, of the same size as the lounge room, near the 3d st. end. Besides the lobby there will be offices, a stranger's room, cloak room, stock room, toilets and kitchen on the main floor.

Hauke & Eha, St. Paul, have the heating contract; Lee & Hoff Manufacturing Co., St. Paul, elevators; F. J. Spriggs, St. Paul, plumbing; electrical work, Electric Construction Co., St. Paul.

PERSONAL AND GENERAL NEWS

Doings of the Northwest this Week Boiled Down for Busy Readers

PERSONAL AND GENERAL.

D. D. Boubakker has returned to Northfield, Minn., after a season's work at Hankinson, N. D., representing the Fairmont & Veblen railroad construction contractors.

Stanley Bros., Krem, N. D., have contract for rip-rapping between Hazen & Beulah on Knife river.

Fred Stark, contractor, Red Cliff, Sask., has returned after a trip to New Rockford, N. D.

Wm. Riese has succeeded Lee & Rees, contractors, Wilburn, Mont.

A new Minneapolis contracting firm began business recently, W. H. Arrell & Co., with offices at 733 Palace building. The firm is composed of W. H. Arrell, R. F. Steinmetz and G. G. Samuelson, all formerly with Jas. Leck & Co. The firm is building the United States Register building, Cedar near Franklin.

Omaha contractors are ending work for the winter, among them Geo. Parks, (National Construction Co.) Daniel Hanron and James Parks.

Charles Lindley, contractor, Minot, N. D., is recovering from an operation for stomach trouble.

Patrick Welch, Spokane contractor and capitalist, formerly of St. Paul, has been critically ill, following an operation.

Houses and business buildings at New Rockford, N. D. are included in the plans of the Hugh Peoples Land & Investment Co., capital \$300,000, at New Rockford. Gov. L. B. Hanner is vice president. Improvements at Bremen and Brantford are planned. Hugh Peoples is president of the company.

B. G. Nelson, formerly contractor at Red Wing, Minn., is now at the head of What Cheer Clay Products Co., What Cheer, Iowa.

Hans F. Anderson, contractor, of Red Lodge, Mont., will spend the winter at Riverside, Cal.

Contractors Frank Cuene, Louis Everard, G. H. Fleck and Beauregard Bros. did a great deal of the unusual amount of general work in De Pere, Wis., this year.

ARCHITECTS AND ENGINEERS.

Kingman R. Seiler of Red Wing, Minn., is mentioned as probable superintendent of roads and bridges of the county beginning the first of the year. He has been street commissioner of Red Wing for seven years.

A. M. Burt has been promoted to chief engineer of maintenance of way of the Northern Pacific.

W. E. Skinner, of Winnipeg, has been retained as consulting engineer for the town of Kenora, and was instructed to make a report upon the cost of producing power at the municipality's hydroelectric plant. This statement will, of course, include the expense of development, the amount of power at present produced, and the cost of distribution.

George A. Ralph, formerly engineer of the State Drainage Board of Minnesota, recently inspected the route of a proposed judicial ditch near Red Lake Falls.

J. B. Armstrong, chief engineer of the Hudson's Bay railway, has tendered his resignation to the minister of railways, and it has been accepted. Mr. Armstrong proposes engaging in the construction business. He will be succeeded by J. Porter, who is on Major Leonard's staff in the construction of the National Trans-continental.

George H. Blodell has resigned his office as superintendent of street maintenance of Duluth, Minn.

Albert B. Stetson, consulting engineer and former vice president of the Bucyrus Co., South Milwaukee, Wis., died, aged 82 years.

W. J. Roberts, state highway commissioner of Washington, has been appointed consulting engineer in connection with the construction of the projected \$3,000,000 system of county roads in King county, Wash.

Charles H. Sweetser, M. American Society of Civil Engineers, senior highway engineer, United States office of public roads, has been granted a leave of absence for the purpose of supervising the construction of improved highways in Calcasieu Parish, La. The highways will be built with the proceeds of the \$900,000 bond issue recently authorized by the voters of the parish. Mr. Sweetser is a graduate of the Leland Stanford University, and also studied at the Massachusetts Institute of Technology. In 1904 he was appointed highway engineer for the department of public works of Hawaii. From 1907 to 1909 he was supervising engineer of improved highways for the state highway department of Washington, and between 1909 and 1911 he was chief engineer of that office.

J. S. Chuppert of Kansas City, Mo., has been appointed architect for the Medicine Hat schools at a salary of \$3,000.

A. C. Eschweiler, Hugh Guthrie and Henry Rothier represented the Milwaukee chapter of the American Institute of Architects at the New Orleans convention that opened on Dec. 2.

The American Society of Mechanical Engineers will have its next annual convention in Minneapolis in May, 1914. The Minnesota branch at its last meeting elected officers as follows: Max Toltz, chairman; Charles L. Pillsbury, vice chairman; E. J. Heinen, secretary and treasurer; Oliver Crosby and Le Roy Brink of St. Paul, Professors John J. Flather and W. H. Kavanaugh of the University of Minnesota, and W. T. Hugo of Duluth, executive committee. The next meeting of the Minnesota branch will be Dec. 10 at the university library building.

At a Regents' meeting to consider plans for University of Wisconsin buildings, Regent Hammond said:

"We should rather put our faculty members in the background and from an architectural standpoint accept the judgment of professional men. Our policy in disputing the judgment of the architect and giving way to the judgment is a wrong principle."

Frank L. Anders, city engineer of Fargo, N. D., inspected the installation of new water mains at McClusky.

A. W. Dwyer, civil engineer, has opened an office at Three Forks, Mont., with J. R. Westphal in the Three Forks State Bank block.

City Engineer Capellen of Minneapolis, has been compelled to take a rest on account of overwork.

Ross R. May is a newly appointed assistant city engineer at Butte.

Professor Shepardson, of the state university, Minneapolis, said Monday that equipment for the wireless is being received and that soon Paris may be in touch with the university through the station.

Officers will be elected by the Gargayle club of St. Paul the second Monday in January. John W. Bennett addressed the club at the last meeting on "A City Architect."

LARGER QUARTERS FOR THE CANADIAN H. W. JOHNS-MANVILLE CO., LTD.

The Toronto branch of the Canadian H. W. Johns-Manville Co., Ltd., announces its removal to more spacious quarters at 19 Front st. E. This new store and warehouse has a floor area of approximately 35,000 square feet and is situated in the heart of the wholesale district.

In their new quarters this firm will be able to carry a larger stock and have ample space for the display of their complete line of J-M asbestos roofing, packings, pipe coverings, building materials, electrical and railroad supplies, automobile and plumbing specialties, etc.

The entire building will be lighted by their well-known Frink and J-M Linolite system of lighting and one room will be used for exhibiting these systems of lighting.

BRICK AND TILE NEWS

The Hebron Brick Co. will double its capacity in 1914. The bricketting plant which the company will install will cost about \$200,000. Gas will be used for burning brick and bricks will be the by-product. About fifty tons daily are expected, with prices at five to seven dollars a ton.

New officers of the Valley City, N. D., Brick Co. are, president, K. S. Ramseth; vice president, Geo. Goulett; secretary-treasurer, M. J. Boyd; directors, Wm. Engles of Fingal, S. L. Davidson of Valley City, and the officers. Mr. Davidson will continue as manager. Prospects for next year's business are excellent and the annual meeting was enthusiastic. Steel is in for the new construction and it will be completed in the spring.

One way of settling a dispute as to the number of bricks furnished by one concern for the use of another is to ascertain by count, even after they have been laid. So opines Civil Judge J. E. Cordes, of Milwaukee, who adjourned a case for two weeks to permit the computation. A heating contractor was sued for a small balance due on a bill for 8,000 bricks used in installing a boiler at a hospital at Waupun. Payment was withheld because of an alleged shortage of 800 bricks. With one man's word as good as another the court suggested itself to the court as the real solution. So the brick work about the boiler is to be given a survey of the mathematical variety.

FAST CONSTRUCTION AT LAMP FACTORY.

A notable instance of rapid but good construction is recorded by the present condition of the large factory being built at Broadway and Jackson N. E. for the manufacture of the Mazda incandescent electric lamps. Persons who a short time ago were reading announcements that the National Quality Lamp Co., of Cleveland, O., had decided to establish a large branch factory in Minneapolis, would be surprised on visiting the site to see the great building virtually complete, except equipment. The excavation was started July 1, and the actual construction of the building about Aug. 1. It is 3-story high, solid brick, 388 feet front on Jackson, 262 on Broadway, L-shaped, with each L 60 feet wide, the basement extends under the whole building in rock. The building has steel girders, wood joists, steel columns in basement, continued in upper floors by wood columns, Oregon fir sub-floors, hard maple top floors, with asbestos between the floors for fire protection. The 36,000 square feet of roof is covered with Barrett specification roofing put on by Henseler & Naused, 3000 Lyndale N. There were 800 yards of rock excavation for sewer connections, and other rock excavation, making a total of 1,850 yards. S. J. Groves & Sons, earth excavators, moved 9,659 yards. The general contractors of the building, Samuel Austin & Son Co., Cleveland, Ohio, who furnished all the building plans, being the designers as well as builders, did the rock excavating.

Several details of the general contractors' system of work could be mentioned to show how the rapid work was accomplished while maintaining the good results. One important aid was a crane with a 70-foot arm, which took loads of lumber as delivered and lifted them entire to the various floors where they were used. All mortar was machine-mixed; six elevators carried brick. The Austin Co. has built eight or nine of these plants for the Mazda lamp. In this instance they were given the best of assistance and service by all of the material contractors, who kept them stocked up and took extra pains whenever necessary to prevent any delay in building. Even the railroads entered into this spirit of co-operation. There was virtually no delay at any time.

The lumber was furnished by the Shevlin-Carpenter Lumber Co.; basement brick and 3,000 barrels of Lehigh cement, Landers Morrison & Christenson Co., 315 Lumber Exchange; face and interior brick, Belt Line Co., 512 Andrus building; plumbing installed by Ireland-Simmons Co., 518 2d av. S.; Bedford stone by J. M. Sullivan, 1036 Lumber Exchange; hot water heat installed by general contractor; glass, Pittsburgh Plate Glass Co.; sash, Smith & Wyman Co.; millwork, Great Northern Lumber Co.; Corbin hardware by Warner Hardware Co., 13 S. 6th st.; paint, Gardner Hardware Co., 304-6 Hennepin; steel, Minneapolis Steel & Machinery Co., and McClintock-Marshall Co., Pittsburg; elevator contract not let; nails, carload, Warner Hardware Co.

Total investment for this factory will be about \$300,000. Material used includes 1,000,000 feet Oregon lumber, 2,200,000 brick, 137,000 feet of hardwood flooring, two carloads of pipe, four cars of American Radiator Co. radiators, two cars sewer pipe by Crane & Co., and Marshall-Wells Co., Duluth. There will be a lunch room in the factory for the employees, self-serving plan installed by owners of plant. A brick stack 72 inches by 152 feet high, is to be built. The general contract is on the percentage plan. Nearly one-third of the wall space is devoted to large windows 9x9 feet, and there will be twelve wash rooms, and a medical aid room. The manufacture of lamps is to begin about March 1. Joseph I. Ruble of Cleveland has been in charge of the Austin Co. Construction in detail has been followed so closely in accounts, that the cost of any day's work could have been given any evening. Weekly statements have been rendered.

PLANS AT BUILDERS' EXCHANGE, MINNEAPOLIS.

Plans on file at the Builders' Exchange, Minneapolis, Dec. 6: Addition to soldiers' home library, Minneapolis, bids opened Dec. 15; Sacred Heart Academy, Fargo, N. D., bids opened Dec. 16; foundation work, Wisconsin state capitol, bids opened Dec. 16; Rosebud Indian school, S. D., bids opened Dec. 17; electrical construction, power plant, Rochester, Minn., bids opened Dec. 17; telephone system, watchman's clock system, hospital, Rochester, bids opened Dec. 17; mechanical equipment, school, Foley, Minn., bids opened Dec. 19; school, Foley, Minn., bids opened Dec. 19; fire escapes, Rugby, N. D., bids opened Dec. 20; high school, Montevideo, Minn., bids opened Dec. 29; state sanatorium buildings, Walker, Minn., bids opened Jan. 2; court house, Flandreau, S. D., bids opened Jan. 6; store, Devils Lake, N. D., no date set; club house, Livingston, Mont., no date set; produce house, Swift & Co., Creston, Iowa, bids in; postoffice, Mandan, N. D., bids in; piping, state hospital, Rochester, Minn., bids in.

Contracts awarded: School, Parkston, S. D., Schlitz Construction Co., Emery, S. D.; school, Glendive, Mont., Bell & Fradzen, Savage, Mont.

RIGHT TEMPERATURE IN THE HOME

WITH this perfect device you can determine exactly the inside temperature regardless of outdoor conditions or variations—whether 20 below or 40 above. All adjustments are made instantly from the thermostat which has its place on the wall in the living room.

The "MINNEAPOLIS" HEAT REGULATOR

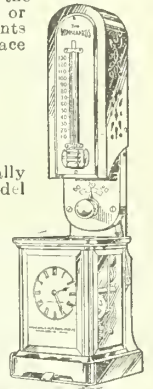
With 8-day Clock Time Attachment

The clock attachment enables one to secure automatically and silently a change of temperature at any set hour. Model No. 60 (same as illustration) shows 8-day clock.

The "Minneapolis" is the "original" and "best" heat regulator—the standard for over 30 years.

Requires a service each year worth many times its cost. Saves many steps. Prevents extremes of temperature. Insures less fuel. Used with any heating plant. Sold and installed by heating trade under positive guarantee of satisfaction. Write for booklet.

MINNEAPOLIS HEAT 2768 4th Av. S., Minneapolis
REGULATOR CO. St. Paul Office, 140 Endicott Arcade



CEMENT AND CONCRETE

F. N. Carss, city engineer, of Des Moines, Iowa, declares that concrete paving is a success and is practical for what it is claimed to be—a good, cheap pavement. He says that the cement paving in Des Moines and Polk county is as good as the famous roads of Wayne county, Ind. The only difference is that Wayne county is forever advertising to the world that it has good roads, and Polk county does not, he asserts. Mr. Carss and Councilman Myerly say that they do not care to get into a public discussion of the worth of cement paving. They declare that if there are persons in Des Moines who have lost faith in this kind of material, their confidence can be restored by viewing some of the pavements already in service. Next year will be the greatest year for cement pavement that Des Moines has ever known, unless something interferes. We expect to put in two and one-half miles of pavement on the Darley road to extend the Bloomfield road pavement to the city limits by way of 30th st.; one and one-half miles of pavement to connect the Beaver av. pavement with the city limits and one and one-half miles of pavement on East 14th st. The material for the pavement of SE. 6th av. from the river to the Indianola road has not been selected.

The administration of the Rhine-Westphalia Cement Syndicate at Bochum has notified the cement factories and cement unions in Germany that, in consequence of the refusal of a number of works to prolong during the year 1914 the agreement regulating and fixing prices, the sales of cement will be free from limitation for the coming year. In order to reduce competition among themselves, fourteen Westphalian cement works which belong to the syndicate have formed a combination to be known as the Union of Westphalian Portland Cement Works. At the meeting of the syndicate held Sept. 29, 1913, it is reported that the proposition to fix the maximum sale price at 150 marks (\$22.70) per ten tons (2,240 American pounds each) was voted down, as also the motion to suspend sales until Nov. 1, 1913. The statement at a meeting of the Holland Syndicate, Sept. 30, 1913, that a number of Belgian cement factories, contrary to agreement, had made advance sales, has brought up the possibility that this syndicate also may find it necessary to dissolve.

FIREPROOF CONSTRUCTION RIVALING WOOD.

Published statements by a Chicago engineer contain the advice to states which grow no lumber, that builders better give heed to the claims of fireproof construction, even in residences. In North Dakota, he says, there is an abundance of valuable clay from which every article used in a fireproof structure can be made.

The cost of a fireproof house is placed within 15 per cent of the wooden building and the materials listed include: Vitrified brick foundations, vitrified brick basement floors and piers, fancy face brick outside walls lined with hollow tile, hollow tile partitions, hollow tile floors faced with the finest glazed surfacing, hollow tile ceilings, Spanish tile roof.

CONSTRUCTION AND CONTRACT NEWS

OF SPECIAL VALUE TO ENGINEERS, CONTRACTORS, BUILDERS AND MANUFACTURERS

MINNEAPOLIS, MINN.

Office: 912 Lumber Exchange. Phones: N.W. Main 3902; T.S. 2194.
Please telephone news not later than Wednesday.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

Frank J. McCrossen, 1130 Irving av. N., 2-story frame duplex; Tom Hollick, builder.....	2,500
Peter Ostlund, 3707 N. 6th st., 1½-story frame dwl.....	1,000
Lewis Rudick, 1008-10 N. Fremont av., 2-story frame duplex.....	4,000
A. M. Smith, 249 Hennepin av., electric freight elevator, F. A. Pigeon, builder.....	1,400
E. L. Ractor, 4315 N. Humboldt av., 1-story frame addition to dwl., concrete block foundation, Aug. H. Schaper, builder.....	1,000
Saxe Bros., 432-36 2d av. S., 1-story brick and alterations, P. E. Nelson, builder.....	10,000
A. F. Hasselgren, 3532 14th av. S., 1½-story plaster veneer dwl.....	2,600
P. R. Hamilton, 701-5 Plymouth av., 2-story brick store and offices.....	9,000
Mary V. Winters, 825 S. 9th st., stone foundation.....	1,000
Benj. Greenberg and S. Fleisher, 719-21 6th av. N., 1-story brick and 2d story.....	5,000
Louis Fleisher, 1214 James av. N., 2-story plaster veneer duplex.....	3,500
Knut Dalsoren, 3034 40th av. S., 1½-story plaster veneer dwl.....	2,000
E. C. Warner, 3030 W. Calhoun boulevard, interior finishing of dwl, R. Billingsly, builder.....	42,100
S. R. Child, 3838 4th st. N., 1½-story frame dwl.....	1,000
S. R. Child, 3842 4th st. N., 1½-story frame dwl.....	1,000
S. R. Child, 3846 4th st. N., 1½-story frame dwl.....	1,000
D. E. Allan, 3853 Garfield av., 1½-story plaster veneer dwl.; C. P. Jones, builder.....	2,000
John Atland, 3201 20th av. S., 1-story frame dwl.....	1,800
V. H. Van Slyke, 236 Ridgewood av., 2½-story brick veneer dwl.; N. Jensen, builder.....	9,400
Silas King, 2645 Clinton av., 1½-story plaster veneer dwl.; H. E. Johnson, 4040 Pleasant av., 1½-story plaster veneer dwl.....	3,500
E. D. Haaf, 4645 Nicollet av., 1½-story frame dwl.....	2,000
J. H. Viner, 2519-21 S. Emerson av., 3-story brick flats (7); C. O. Martenson, 505 20th av. N., 3-story brick store and rooming house; contract not let.....	5,000
Gust A. Johnson, 1514 N. Newton av., 1½-story frame dwl.....	2,000
John L. Molsness, 4716 17th av. S., 2-story frame dwl.....	2,000
Emma L. Lilienthal, 2617 Clinton av., 2-story plaster veneer flats (8).....	7,500
Karl A. Blom, 1939 Lincoln st. NE., 1½-story plaster veneer and shingle dwl.; O. S. Burman, builder.....	2,000
Frank Gustafson, 3139-41 18th av. S., 2-story plaster veneer flats (4).....	6,000
Schurmeier Wagon Co., 1315 Hawthorne av., 2-story brick wagon factory; Perry Swanson, builder.....	15,000
Christine Lind, 3527 Fremont av. N., 1½-story frame dwl.; Gust Andrell, 2741 Lyndale av. S., 1-story frame and brick veneer dwl., alterations and repairs to store and flat....	4,000
W. C. Wilson, 926 Fulton st. SE., 2-story plaster veneer flats (4).....	4,500
Alfred Larson, 3517 16th av. S., 1-story brick veneer dwl.; Fifth Church of Christ, Scientist, 300 12th av. SE., 1-story brick and stone church; H. N. Leighton Co., builders....	50,000
Mary Steffens, 3019 N. 4th st., 1½-story plaster veneer dwl.; A. G. Lund, 2808-10 S. 9th st., 2-story plaster veneer duplex.....	3,500

W. H. Arrell & Co., general contractors, 733 Palace building, report sub-contracts on United State Register building, Cedar and 21st, have been awarded as follows: Steel, Minneapolis Steel & Machinery Co.; roof and galvanized iron, Stremel Bros.; painting, E. J. Wheeler, 716 7th av. S.; glass, Northwestern Glass Co.; millwork, Northside Sash & Door; steel sash, Birtram W. Ranson, Plymouth building; brick Flower City Brick Co., 3414 Marshall; stone, McLeod Stone Co.; cement, P. G. Speakes; face brick, Hydraulic Pressed Brick Co.; lumber, O. E. Deckert, 516 10th av. N.

Hewitt & Brown, architects, 715 4th av. S., will prepare the plans for the Worcester, Mass., Polytechnic Institute gymnasium; sketches submitted and design taken in competition with architects in various parts of the country; preliminary plans started; construction to begin in the spring; brick, stone trim, 3-story, all modern, gymnasium improvements and equipment; general design comprises large central structure with two flanking towers, cost about \$100,000; notable instance of east coming west for plans.

Wm. M. Kenyon & Maurice F. Maine, architects, Metropolitan block, have prepared plans for an addition to the Meyer Arcade building, 10th and Nicollet, on 10th st.; 40x167, 3-story, face brick, hollow tile, concrete, two store fronts; hardwood floors and finish, terrazzo floors, marble work, ornamental iron; offices and shops second and third floors; cost \$40,000; general contract let to J. & W. A. Elliott Co., Lumber Exchange; excavation completed.

J. E. Nason, architect, Corn Exchange, has completed plans for a store and flat building for H. C. Sherry, 410 Adams

N. E.; 40x60, brick veneer, concrete or stone foundation, hardwood trim, no heat, electric light, laundry trays, pitch and gravel roof, electric bells, patent store front, three baths with Keene cement; owner taking figures.

C. A. Boehme, architect, Kasota block, has completed plans for a 1-story brick store at 819 20th av. N.; metal front, hardwood floors, flat roof, electric light, steam heat, quarter-sawn oak, hard plaster, plate glass, prism glass, galvanized iron cornice; \$4,000; figures taken by the owner, H. A. Fritz, 2358 James av. N.

C. A. Boehme, architect, Kasota block, has completed plans for a store and rooming house at 505 20th av. N., for C. O. Martenson; 19x70, 3-story, brick, concrete foundation, steam heat, shower bath, Fama Stonewood floors in baths, tile entrance, electric light, gas, metal sash; owner taking figures.

Remodeling of the interior of the Boston block is being planned by the owner, Wm. Minot, of Boston, who has been in the city this week, conferring with A. E. Zonne, Conklin & Zonne, real estate, 1st av. S. and 6th st.; improvements will include new passenger elevators.

*Permit was issued for the W. J. Clarke residence, 58 Groveland Terrace, plans by Bertrand & Chamberlin, architects, Northwestern Bank building; 70x51, 2-story, brick and tile, two garages in connection, cost \$9,890; N. Jensen, general contractor, 2726 Chicago av.

Permit was issued for a dwelling at 2326 Ridgwood, for V. H. Van Slyke, 2409 Colfax av., stone foundation, 48x40, brick veneer, completely modern, cost \$9,400, general contract to N. Jensen, 2726 Chicago; plans by Downs & Eads, architects, New York Life building.

Enlargement of plant will follow deal of H. E. Wilcox Motor Co., which has purchased, H. E. Wilcox Motor Car Co., Minneapolis, increased capital stock \$2,500,000, and will add to output of motor trucks. O. P. Briggs, president, 2629 Lake of the Isles blvd.

Permit was issued for addition to store, 1719-21 6th av. N., for Ben Grenberg and Samuel Fleisher, 49x80, brick, plumbing, wiring, flat roof, hardwood trim, cost \$5,000; plans by Rose Engineering Co., Plymouth building; Fleisher Rose Co., contractors.

A block of three stores and three flats and two offices will be built by P. R. Hamilton, 1700 Hillside av., at 701-5 Plymouth av.; 66x54, brick, stone and concrete foundation, hardwood floors, plate glass, plumbing, steam heat, wiring, baths, cost \$9,000.

John Jacobson, general contractor, Marshalltown, Iowa, is reconstructing M. & St. L. roof, Cedar lake; asbestos; new smokestack; cost about \$8,000; Mr. Jacobson is building a garage at Marshalltown for Mrs. Bowman, Marshalltown.

*Kirby T. Snyder, architect, Plymouth building, has plans in progress for a high school at Grenada, Minn.; 60x80, 2-story and basement, brick, semi-fireproof, concrete foundation, steel stairs, steam heat, fan system of ventilation.

H. E. Johnson, 3200 Bloomington, will build a 1½-story plaster veneer dwelling at 4040 Pleasant, 28x30, concrete block foundation, hardwood throughout; plumbing, wiring, tile bath, sleeping porch, hot water heat, \$3,000; day labor.

*W. C. Wilson, 812 Washington av. S. E., is building a 4-family flat, at 926 Fulton, SE., 36x39, concrete block foundation, hardwood trim, plumbing, gas, hardwood floors, electric light, laundry, hot water heat, \$4,500; day labor.

Geo. D. Dayton, of Dayton's department store, who has purchased a tract for a model industrial town on the Mississippi between Minneapolis and Anoka, has visited Gary, Ind. and Pullman, Ill., to study their plans.

C. L. Pillsbury, consulting engineer, Metropolitan block, has plans out this week for Walker sanitarium and New Ulm high school, mechanical equipment; plans next week; St. Paul public library plans may be out next week.

*Permit was issued for Fifth Church of Christ Scientists, 300 12th av. SE.; Keese & Colburn, architects, Donaldson block; H. N. Leighton Co., general contractors; 95x132, brick and stone, modern, \$50,000, foundation in.

*Kirby T. Snyder, architect, Plymouth building has plans in progress for a school at Laurens, Iowa; brick, reinforced concrete, 2-story and basement, cut stone trim, 132x74, steam heat, plumbing, wiring, fan ventilation.

Permit issued for interior finish, E. C. Warner residence, West Calhoun boulevard; cost \$42,100; plans by Bell, Tyrie & Chapman, architects, Auditorium block; R. Billingsley, general contractor, Kasota block.

Silas King, 2713 2d av. S., is building a 1½-story plaster veneer dwelling at 2545 Clinton, 28x38, concrete foundation,

modern plumbing, electric light, gas, hardwood throughout, tiling, cost \$3,000; day labor.

A 7-story hotel building is under consideration for property at 242 Hennepin, leased by McKnight estate, McKnight building, to I. Weisman, 2208 Emerson S.; site occupied by 3-story brick building, 44x157.

December permits for first nine days came in at a rapid rate totaling \$265,940; same 1912, \$178,095; total for 1913 up to December 9th, \$11,974,000; same period 1912, \$11,444,000; gain over last year, \$529,000.

Permit was issued for the Schurmeier Wagon Co., factory, 1315 Hawthorne, 72x121, 2-story, brick, \$15,000; Perry Swanson, contractor, 433 Dayton, St. Paul; plans by Toltz Engineering Co., St. Paul, Minn.

Permit was issued for 2-story plaster veneer flat, eight apartments, 2617 Clinton, for Emma Lilienthal; plans by S. J. Bowler, architect, Boston block; 42x97, stone foundation, modern, \$7,500; day labor.

Permit was issued for the flat building for J. H. Viner, 2121 13th av. S., at 2519-21 S. Emerson; 32x58, 3-story, brick, all modern, steam heat, cost \$18,000; plans by Chas. H. Beckel, day labor.

Louis Fleisher, 1015 Aldrich N., will build a duplex at 1214 N. James; 26x40, plaster veneer, plumbing, wiring, hardwood trim, laundry; cost \$3,500; Goldberg & Fleisher, contractors.

A 4-flat will be built by Frank Gustafson, 914 W. 36th, at 3139 18th av. S.; 39x40, plaster veneer, hardwood trim, plumbing, gas, hot water heat, electric light, laundry; \$6,000; day labor.

*Work has started on the addition East to the Armory; J. & W. A. Elliott, general contractors, Lumber Exchange; plans by Jackson & Stone, architects, Security Bank building.

*A 2-story plaster veneer flat building will be built by Ole Johnson at 1920 Hamline av., Prospect Park; 38x52, stone foundation, \$6,500, day labor; all modern, hot water heat.

*R. M. Selb will build a four-family flat at No. 7 Barton av. SE., 40x150, plaster veneer, 2-story, concrete foundation, hot water heat, plumbing, wiring, laundry, \$6,000; day labor.

*A duplex will be built by A. G. Lund, 1907 S. 2d, at 2808 S. 9th st.; 28x44, plaster veneer, concrete block foundation, hardwood trim, plumbing, gas, \$3,500; day labor.

International Casement Sash are now being installed in the new Art Museum building of this city. Oscar F. Symons & Co., representatives, 838 Plymouth building.

*Mary Steffens, 3042 W. 43d, is building a plaster veneer dwelling at 4019 N. 4th st., 26x44, hardwood trim, floors, gas, bath, modern plumbing, \$2400, day labor.

*Aug. Lindblad will build a duplex at 2220 26th av. S., 26x46, stone foundation, plaster veneer, plumbing, gas, \$3,700; M. J. Mattison, builder, 3040 3d av. S.

*Gust Andrell is building a frame and brick veneer addition and making alterations at 2741 Lyndale S., 30x59, 2-story, store and flat, day labor.

In this column last week Harry W. Jones, architect, was erroneously located in the Plymouth building. He is still in the Lumber Exchange.

*Alfred Larson 3121 17th av. S., is building a brick veneer dwelling at 3517 16th av. S., 26x38, hardwood trim, plumbing, gas, \$2,500, day labor.

Northeast residents through Van Cleve Improvement association opposed depression of railroad track and demand all to be elevated.

A fireproof building, cost \$25,000, will be built by E. C. & Chas. Gale, at 11 9th st. S.; E. C. Gale, 800 Security building.

SIoux CITY, IOWA

Sioux City Office: 310 Iowa Building; R. V. Sager, Representative.

Items Marked with Asterisks Not in Daily Sheets.

F. E. Colby, architect, Davidson building, is drawing plans for a barn for the Dougherty & Bryant Van & Storage Co. It will be steel and concrete construction and will have dimensions 160x200.

*The Ryan Electric Co. have been awarded the contract for the wiring for the hospital for the Florence Crittenton home for \$1,325; Beuttler & Arnold, architect, Security building.

*Beuttler & Arnold, architects, Security building, are drawing plans for a residence for D. M. Stoddard at Sloan, Iowa. It will be 48x44, 2-story and basement, brick construction and will cost about \$18,000.

*Bids will be opened Dec. 15, for the construction of the building for James Wallace at 5th and Douglas sts. Geo. W. Burkhead, architect, Grain Exchange building.

ST. PAUL, MINN.

404 Scandinavian American Bank Bldg. Phone: N.W. Cedar 1683.
Mail or telephone news not later than Wednesday.

BUILDING PERMITS.

Mrs. Bright 121 Macalester, 2-story frame dwl., Macalester near Princeton; C. E. Johnson, builder.....	3,100
J. C. Pederson, builder, 850 Cherokee, 1½-story frame dwl., Smith near Winona.....	2,000
E. G. Walton Agency, builder, 2-story frame dwl., Midway near Hope.....	5,500
E. G. Walton Agency, 1-story frame dwl., St. Anthony near Oxford.....	1,875
J. P. Fetsch, builder, 694 Grand, 2-story brick and stucco dwl., Lincoln near Avon.....	5,000
J. P. Fetsch, builder, 694 Grand, alterations, 846 Lincoln near Avon.....	4,500
O. W. Wilson, 1690 Minnehaha, 2-story frame dwl., Van Buren near Pascal.....	3,000
L. A. Hughes, builder, 416 Pioneer, 1½-story frame dwl., Fauquier near Duluth.....	2,800
Pillsbury Flour Mills Co., Minneapolis, elevator, 469 7th near Willius, Gust Lagerquist Co., builder.....	1,100
Louis Friedmann, 893 Portland av., 1-story brick motion picture show, Eaton near Fairfield, Jos. Tietz, builder.....	10,000
Smythe Printing Co., 2-story and concrete printing office, 9th st., near Temperance, J. W. Butler & Bro. Co., builders.....	36,000
G. and A. Peterson, 749 Linwood Place, 1½-story frame dwl., St. Clair near Pascal, Ridgewood Stone Co., builders.....	2,000
John G. Eckhoff, 2020 Grand, 1½-story frame dwl., Lincoln near Prior, John G. Eckhoff, builder.....	2,500
Agnes M. Bussere, 1091 Fauquier, alterations and repairs, 1½-story frame dwl., 1091 Fauquier near Frank; Agnes M. Bussere, builder.....	15,000
J. Aarrock Security Co., 220 Globe building, 2-story brick and veneer apartment house, Taylor near Snelling; A. Swanson, builder.....	14,000
W. J. Dutcher, 507 Stryker, 1-story frame dwl., Robie near Stryker; W. J. Dutcher, builder.....	2,500
Crescent Creamery Co., 3d and Minnesota, 1-story brick store, Snelling near Carroll; A. G. Erickson, builder.....	4,000
F. Modzejewski, 395 Van Buren, 1½-story frame dwl., Virginia near Como; B. T. Penning, builder.....	2,000
John M. Lee, builder, 1999 Goodrich, 2-story frame dwl., Lincoln near Prior.....	3,500
John Florin, 1396 Van Buren, 1½-story frame dwl., Seminary near Hamline; John Florin, builder.....	2,400
Fred Diessler, builder, 463 Edmund, 1½-story frame dwl., Edmund near Grotto.....	3,000
Central Warehouse Co., builders, Minnesota Transfer, 1-story frame shed, Territorial road.....	1,400
L. A. Hughes, builder, 416 Pioneer, 1½-story frame dwl., Fauquier near Duluth.....	2,500
L. A. Hughes, builder, 416 Pioneer, 1½-story frame dwl., Fauquier near Duluth.....	2,500
Jas. A. Homa, 553 Manomin, 2-story frame dwl., Grand near Cretin and Finn; Jas. A. Homa, builder.....	3,000
J. Rosenfeld, builder, 7 Douglas, 1-story brick store, Pleasant near Walnut.....	2,000
Hamm Brewing Co., 2-story brick store, 7th near Cypress; Wm. Baumeister, builder.....	11,000
George Thill, 214 Fairview, 1½-story frame dwl., Grand near Fairview; George Thill, builder.....	2,300
Wm. Best, 1½-story frame dwl., Conway near Mendota; C. C. Dornfeld, builder.....	1,800

Ramsey county program of improvements for 1914 includes two bridges; Arcade st., Phalen outlet, 30 feet wide including two 5-foot walks, steel or concrete; 20 to 25 miles permanent roadway, clay and gravel surface; resurfacing 5 miles old macadam with asphalt macadam; lake improvements to include 40-foot channel between Phalen and Jarvis; will ask for bids to supply another dredge. J. H. Armstrong, county engineer, County building.

H. E. Erickson, architect, Union block, has prepared plans for a 4-family flat at 644 Dayton av., for M. Kanevsky and A. Finkelstein, 589 Wabasha; brick veneer, frame, steel angles, pressed brick, hot water heat, electric light, galvanized iron cornice, composition roof, plate glass, art and leaded glass, floor tiling, oak and birch finish, foundation in; 36x66, 2-story; Sam Prohofskey, builder, 168 Eva; cost \$12,000; owner takes bids.

W. D. McLeith, architect, 1505 Pioneer building, states the large flat building to be erected at Summit and Wabasha, recently reported in this column, has been increased from 7 to 9 stories and the total number of apartments to 160; brine refrigeration coolers in all of the flats; preliminary plans out first of the year; owner, care Sperry Realty Co., Pittsburgh building.

J. P. Fetsch, 694 Grand, is building a 2-story brick and stucco dwelling, 24x35, concrete foundation, on Lincoln between Avon and Victoria; hot water heat, fire place, cement and hardwood floors, tile bath, laundry, electric light, bookcases, cabinet, china closets cost \$5,000; also alterations at 846 Lincoln; to cost \$4,500.

Aarrock Security Co., 220 Globe building, is building a flat building for five families, on Taylor between Snelling and Walker; 40x53, 2-story brick, hot water heat, concrete foundation, hardwood floors and trim, electric light, laundry, tiling, porches; cost \$14,000. A. Swanson, 730 Capitol Heights, contractor.

Mrs. Bright, 171 Wacouta, is building a 2-story frame dwelling, 24x30, concrete foundation, on Macalester between St.

Clair and Princeton; hot water heat, hardwood throughout, tile bath, laundry, sleeping porch and sun-room, mantle, sideboard, book cases; cost \$3,100; C. E. Johnson, 1036 Magnolia, builder.

W. D. McLeith, architect, 1505 Pioneer building, has furnished plans for the residence of John G. Eckhoff, 2020 Grand av., 208 Lincoln, 24x34, frame and stucco, hardwood floors, Keene cement, bath room, fire place, laundry trays, electric wiring, sleeping porch, cabinet work, plans out for figures.

C. H. Johnston, Jr., architect, Capital Bank building, has furnished plans for the 1-story brick store of the Crescent Creamery Co., at Snelling and Carroll, 30x70, rubberoid roof, hardwood floor and trim; \$4,000; plumbing contract to T. J. Clark; general contract A. G. Erickson, 404 Prior.

Monarch Studios, Shubert building, are remodeling theater at Lake Park, Iowa, for Mrs. D. E. Aich; figures wanted on independent electric light plant, for theater and adjoining building; address Monarch Studio; theater improvements will include new front and stage changes.

Several modern dwellings are being built by the E. G. Walton Agency, Endicott building, 2-story, frame, 32x43, midway between Mt. Hope and Harvard, hardwood throughout, hot water heat, tile bath, \$5,500; 1-story frame, 28x22, St. Anthony between Oxford and Chatsworth.

John H. Wheeler, architect, N. Y. Life, has prepared plans for alterations in the 4-story store building at 381 Minnesota; new front and interior changes; plate and prism glass, tile vestibule, plumbing, heating, wiring; owner N. Y. Realty Co., will take figures next week.

John N. Lee, 1999 Goodrich, is building a 2-story frame dwelling on Lincoln between Prior and Cleveland, 26x28, concrete foundation, hot water heat, electric light, gas, laundry trays, tile bath, leaded glass, sideboard, book cases mantle, sleeping porch, \$3,500.

Estimates and plans for improving parkways and boulevards, St. Paul, will be ready for consideration by park board at the next meeting, Jan. 1, 1914; including Mound and Johnson blvds. and Prospect and Cherokee Heights blvds.

A. L. Garlough, architect, Rosen building, has prepared plans for a duplex on Pleasant near Ramsey, 28x52, hot water heat, tile bath floors, wiring, laundry trays, porches, hardwood throughout, shingle roof, owner will take figures.

O. W. Nelson, 1690 Minnehaha, is building a 2-story frame dwelling on Van Buren between Pascal and Albert, 24x26, hardwood trim and floors, electric light, gas, laundry trays, sleeping porch, hot water heat, tile bath, \$3,000.

H. A. Miller, architect, Pittsburgh building, is preparing plans for a dwelling on Carroll between Mackubin and Arundel, for Anna E. Wagner, frame, hot water heat, cement and wood floors, electric light, plans out in ten days.

Joseph A. Homa, 553 Manomin st., is building a dwelling on Grand between Cretin and Finn, 24x28, 2-story frame, hardwood floors and trim, wiring, tiling, leaded glass, mantle; cost \$3,000; Hans Nelson, builder, 704 Smith.

Orders for retaining walls, 9th between Summit and Smith, and changing grade at College av. are under consideration by board of public works; bridge made necessary by proposed change in 9th st., will cost about \$15,000.

Assistant Fire Chief Leford states that the sprinkler systems would have prevented the large loss in the Seabury Grocery Co. fire; council expect to take up the question of fire sprinkler ordinance soon.

Wm. Baumeister Co., general contractors, Hasckney building, have contract for the modern store building at 7th, Cypress and Earl, for the Hamm Brewing Co., 2-story, brick, 25x70, tiling, steam heat, \$11,000.

A 1½-story dwelling is being built by Fred Dressler, 463 Edmund, on Edmund near Grotto, 24x26, frame, hot water heat, hardwood throughout, electric light, tile bath, laundry; cost \$3,000.

Monarch Studios, Shubert building, are remodeling theater at Pipestone, Minn., for H. J. Updegraff, new front, additional seats, ornamental plastering and tile flooring, enlarged stage.

M. J. Dutcher, 507 Stryker is building a bungalow on Robie between Striker and Winslow, frame, 29x38, hardwood floors and trim, hot water heat, gas, laundry trays; cost \$2,500.

Estimate of \$1,500,000 for Mississippi river improvements between Minneapolis and St. Paul, is same amount for last year, according to Engineer Dushane of the government office.

Bids are in for the copper roof of St. Paul Cathedral but not opened. E. L. Masqueray, architect, Endicott building; book tile (for entire roof) bids will be secured at once.

Several dwellings are being built by L. A. Hughes, 416 Pioneer building, on Fauquier between Duluth and Atlantic; 1½-story, frame, 24x26, and 22x26, \$2,800 and \$2,500.

John Florin, 1396 Van Buren, is building a 1½-story frame dwelling, hardwood trim, plumbing, gas, hot water heat, on Seminary between Hamline and Syndicate.

Bids will be in Dec. 26, for the Catholic church, Huron, S. D. Cost \$25,000; E. L. Masqueray, architect, Endicott building; bids opened at Huron; foundation in.

C. H. Johnston, architect, Capital Bank building, will have plans out soon for the Mitchell commercial building, Minnesota and 4th; 2 stores and offices.

Geo. Thill, 214 Fairview is building a 1½-story frame dwelling, 26x38, hardwood trim, plumbing, gas, \$2,300; on Grand between Fairview and Prior.

Sons of Norway are raising funds for lodge hall and office building near Rice and University; John Branden, secretary, 595 Broadway.

Fire damaged Seabury & Co., wholesale grocery house, 3d and Sibley, \$2,000, on building, owned by Benz & Sons.

Gus Lagerquist, 316 3d av. N., Minneapolis, is installing an elevator for Dickerman Investment Co., 228 E. 4th.

Lighting contracts held up by gas investigation may be awarded by council this week.

☞ MILWAUKEE, WIS. ☞

Office: Hathaway Building. Telephone: Main 1827.

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

Fons & Co., 305 Harrison av., flat.....	3,500
Joseph Schlitz Brewing Co., 3d and Galena, alterations....	25,000
Thompson & Harriman, Farwell av. N. of Windsor, garage	15,000
Chas. Lehrberg, 715 Murray av., flat.....	4,500
J. M. Johnson, 26th av. near Grant, dwl.....	2,400
Mrs. H. Meyer, 580 22d av., flat.....	3,500
Wallace & Smith Co., 86 W. Water st., tank support.....	2,000
Walter Schumann, 833 Booth, alterations.....	1,800
John Rahmen, 4th near Concordia av., flat.....	4,000
F. Krause, 1378 29th av., cottage.....	2,400
Wm. Krause, 1382 29th av., cottage.....	2,400
R. A. Vohe, SW. corner 25th and Chestnut, flat.....	5,000
Henry Rotier, 580 Linus, flat.....	4,500
M. J. Monson, 8th S. of Locust, dwl.....	4,500
Frank Barnekow, 1570 20th st., bungalow.....	3,200
Fred Radtke, 26th N. of Pease, cottage.....	2,000
B. Donath, 37th N. of Wright st., flat.....	3,200
W. F. Zuerner, 1406 14th st., flat.....	3,900
John G. Lavies, 1025 Oakland st., flat.....	4,500
Max Stamm, 66 32d st., flat.....	4,500
Thompson & Harriman, Farwell av. N. of Windsor, garage	15,000
Chas. Lehrberg, 715 Murray av., flat.....	4,500
J. M. Johnson, 26th av. near Grant, dwl.....	2,400
Mrs. H. Meyer, 580 22d av., flat.....	5,500
Wallace & Smith Co., W. Water st., tank support.....	2,000
Phillip Saxe, 6th and Mitchell st., store building.....	250,000
Frank Lietzan, NW. cor. 30th and Lipman st.....	250,000

The board of school directors will receive bids until Dec. 15 for the plumbing and basement floors and for an addition to the building for the Milwaukee public school of trades for boys, on Virginia st., near Hanover st. At the same time bids will also be received for the erection of the Grant st. school building at 24th av. and Grant st. Plans of architects, Van Ryn & De Gelleke, Caswell block, call for a 2-story structure, 175x85, of brick and steel construction, costing \$100,000. Bids asked for are: excavation, concrete and cement, mason, cut stone, steel and iron work, lathing and plastering, tile floor, marble work, hardware and trimmings, sheet metal and slating, painting and glazing, plumbing and sewerage, heating and ventilating, heat regulating apparatus, electrical work, slate black boards. To be completed Aug. 1, 1914. Bond for 30 per cent of bid.

Vaughn, Meyer & Sivert, consulting engineers, Majestic building, are ready for bids on the lighting and power, also electric wiring for the new department store at 6th av. and Mitchell st., to be erected for Philip Saxe for Ed. Schuster & Co., reinforced concrete and fireproof structure, 110x159, 4-story, costing \$250,000. Brust, Philip & Heimerl, 82 Wisconsin st., are the architects. General contract awarded J. W. Utley; plaster, S. D. Bauman; sheet metal, Consolidated Sheet Metal Co.

Architects Leenhouts & Guthrie, 424 Jefferson st., have awarded the contracts for addition to and remodeling of Westminster church, 570 Prospect av. Carpenter, Martin Koster; mason and concrete, Paul Nagtegaal; plaster, C. E. Bartz; tile, Wisconsin Mantle & Tile Co.; sheet metal, Wm. F. Arndt; iron work, C. Hennecke; plumbing, A. J. Maag & Co.; heating and ventilating, Zuehlke Heating Co.; electrical work, Burdick Electric Co.; painting, L. F. Evers; cost \$12,000.

Architects Siebert & Bruecker, 557 12th st., are ready for bids for erecting a brick veneer duplex flat for William Block, to cost \$7,000. The same architects have plans for remodeling and erecting an addition to the National block, at Grove st. and National av. Bids for electric wiring and plastering.

Architect Fitzhugh Scott, 424 Jefferson st., has awarded contracts for the construction of a new residence for John Dunphy at Concord and Marietta avs. General contract, Dunphy-Friedstin Construction Co., including carpenter, mason and concrete work; sheet metal, Consolidated Sheet Metal Works; iron work, Hackendahl & Schmidt Co.; plumbing, S. V. Hanley; lumber and interior finish, Rockwell Manufacturing Co.

Architects Kamschulte & Webster, 403 Grand av., have awarded the contracts for constructing an additional story to the store and flat building of B. Guy, at Broadway and Martin sts. Carpenter John Henning; mason, Dahlman Construction Co.; plaster, Herman Winkelman; plumbing, Wenzel & Henoch; steam fitting, Wagner Bros.; roofing, Cream City Roofing Co.; painting and glass open.

Architects E. Brielmaier & Sons, University building, who planned the new \$120,000 Mt. Sinai hospital, Cedar and 12th sts., report the foundation completed by the general contractor, the Dunphy-Friedstin Co.; carpenter, Reisen & Reisen; electrical Koschim Electric Co.; structural steel contract has been let to Jos. T. Ryerson & Co., Chicago. Other contracts noted previously.

The Wisconsin Telephone Co. will erect a second south side telephone exchange, at 16th av. and Lapham st., to be in operation about Jan. 1, 1915. The company will also lay nearly four miles of underground cable, replacing some of the present aerial and additional underground, and will also do a small amount of new aerial construction, to cost \$35,000.

Architect Carl Barkhausen, 121 Wisconsin st. has awarded contracts for the construction of a garage for the M. Carpenter Baking Co.; mason, Northwestern Construction Co.; carpenter, J. J. Quinn Co.; cut stone, P. Schmidt Co.; plumbing, W. H. Halsey; underground gasoline tank storage system, S. H. Bowser; roofing, Grassler & Gezelschap.

Architect Chas. J. Keller, Germania building, has let contracts for a duplex to be erected at 580 Layton blvd., for Mrs. Hulda Meyer, mason, R. Hoepfner & Son, foundation started; carpenter, Aug. Haback; concrete, Henry Schreier; plumbing, Wm. Klinkert; painting, P. Olsen; electrical work, A. R. Merten; heating, open; cost \$5,500.

Architect Stanley F. Kadow, 988 Kinnickinnic av., has awarded contracts for the erection of a 2-story duplex flat building for Peter Meisenheimer, 133 Stewart st., on 24th av. To be solid brick, 29x58, and cost \$7,000; carpenter, P. Gargen; sheet metal and asbestos roofing, Nic Stollenwork; painting, O. Gargen; others, open.

Architects Leenhouts & Guthrie, 424 Jefferson st., have let contracts for erecting the residence and garage of Henry Sullivan on Beverly place, near Whitefish Bay road; carpenter, A. G. Maddler; mason and iron work, Dunn Bros.; plumbing, S. V. Hanley; painting, H. Weden & Sons Co.; other work open.

The board of estimates of Milwaukee gave tentative approval to bond issues approximating \$2,145,000. They include: schools, \$500,000; relief sewers, \$470,000; Wright st. bridge, \$300,000; harbor, \$250,000; police station, \$250,000; State st. bridge, \$150,000; isolation hospital, \$150,000; park lands, \$75,000.

Architects Leenhouts & Guthrie, 424 Jefferson st., have awarded the following work for erecting a \$6,500 duplex for Edward A. Spranger, at 661 51st st.; carpenter, M. G. Winter; mason, Richard Hoepfner; plumbing, F. C. Kuemeyer; electrical work, owner; remaining contracts later; cost \$6,500.

Architect Edward Kozick, Alhambra building, has awarded the heating in the new H. W. Schwab residence to the Mueller Heating Co. The tile contract on the new Schlitz Brewing Co. store, office and flat building at 11th and National avs., was awarded to the Milwaukee Tile & Mosaic Co.

Architect L. M. Gurda, 920 2d av., awarded contracts for the erection of a duplex flat for Fons & Co., at 365 Harrison av. Mason, Fr. Janowiak; carpenter, J. Lepinski. Same architect, owner and contractors have another duplex at 367 Harrison av. and one at 9th av. and Cleveland st.

The Milwaukee Odd Fellow lodges discussed details of the proposed temple and the committee in charge is rapidly making headway. A modern structure, fireproof, about 3-story, is planned, to cost \$100,000. Oscar Stegeman, president of the Stegeman Motor Car Co., is active.

Architects Van Ryn & De Gelleke, Caswell block, are working on plans and specifications for the new jail and sheriff's residence for Walworth county, to be erected at Elkhorn, Wis. It will be 3-story and basement, of brick, with 12 cells and a juvenile department. To cost \$30,000.

Mead & Morrison, 53 W. Jackson blvd., Chicago, have been awarded the general contract for constructing the trestle work, with overhead tracks, loading bins and cranes with motors, of the new coal docks of the Youghiogheny & Ohio Coal Co., on the Menomonee river here.

The Chicago & North Western R. R. will soon begin work on a passenger depot near Folsom place. A temporary platform has been erected and a permanent station will be erected nearby immediately, to comply with orders of the state railroad commission.

The Jos. Schlitz Brewing Co. is having alterations made to increase storage capacity at 3d and Galena sts. Structural steel and reinforced concrete addition being erected by the contractors: Worden-Allen, general; Paul Riesen's Sons Co., concrete; cost \$25,000.

Architect F. W. Andree, Cawker building, is taking bids this week for erecting the brick veneer residence for W. J. Kershaw, at 49th st. and Grand av. To be 32x46, and cost \$5,000. Bids in all lines of the building trade were opened this week.

Architect Richard E. Oberst, 353 National av., who prepared plans for a frame stable, 36x48, for George Sheriffs has rejected all bids on this work as too high. Plans have been altered to bring the cost within \$1,500 and bids called for.

Architects H. C. Koch & Son, Wells building, have awarded the general contract for erecting the Ticonic Investment building to the Dunphy-Friedstin Construction Co., to be 90x120, 4-story, equipped for light manufacturing; cost \$75,000.

Architect O. C. Uehling, Wells building, is preparing the revised plans for the new St. Malachy's church at Horicon, Wis. The Rev. Wm. H. Eggeor is pastor. Church to be 1-story, of brick, with dimensions of 42x100, and cost \$14,000.

Bernhard Greenwaldt has been awarded the general contract for the erection of a new residence on Bartlett av., near Kennwood blvd., for the Savings & Investment association; cost \$4,000; mason work to Krueger Cement Block Co.

The Burrell Engineering Co. has a large force of men at work to rush to completion, before winter weather sets in, the concrete and cement work on the new grain elevator for the P. C. Kamm Co., at 37th and Greenfield avs.

Architect E. F. Setzke, 1314 Murray av., has completed plans for the construction of a confectionery and ice cream parlor for Louis Busher at 25 Locust st. To be 17x40, will be erected by the owner and cost \$3,000.

The Badger Architects, 916 Walnut st., are about ready for bids on the construction of a store and flat building on Clybourn st., owner's name withheld. To be 2-story, 26x48, of solid brick, and cost \$5,500.

Negotiations are practically completed for an east side site on which local Spiritualist societies will erect a church, costing between \$25,000 and \$30,000. Dr. H. C. Nick, 603 Grand av. is one of the leaders.

Anton Heinz, 1035 Becher st., has been awarded the carpenter contract and B. Dietrich, 990 25th av., the masonry for erecting a new residence for Wm. Johnson, 995 25th av., on 20th av. Cost \$2,500.

Architect Edward Kozick, Alhambra building, is ready for bids on constructing the reinforced concrete and brick garage, 110x150, for Jos. Schlitz Brewing Co. at 4th and Galena sts., noted in last issue.

Architect Anton Dohmen, Metropolitan block, will take bids for constructing a duplex flat for G. Bach on 20th st., near Prairie st. Bids in the various building lines will be opened this week.

The Gray-Clark Co., consulting engineers, are about ready for bids on the reinforced concrete and steel bakery building for Albert Heath, Wells and 21st sts., 130x60, noted last week.

Architect Anton Dohman, Metropolitan block, is preparing plans for a frame residence for Gustave Bach, to be erected on 20th st., near Prairie st.; bids will be asked for shortly.

Architect Robert H. Schmitz, formerly located at 1371 Green Bay av., has removed his offices to the new Berlin Arcade building, recently erected at 3d st. and North av.

Architects Christiansen & Kemnitz, 87 Howell av., are completing plans for the construction of a flat building for Martin Sanderson at Madison and 26th avs. Cost \$5,000.

Architect Leon M. Gurda, 920 2d av., has completed plans for a business building for Felix Skutski, Lincoln av., near Windlake av., solid brick, 40x82, as noted recently.

Fire escapes are being planned to be erected on the Market st. side of the city hall, near Biddle st. The common council appropriated \$5,000 for that purpose.

Herman Dibbert, 1190 Island av., has been awarded the general contract for a duplex flat at Linwood and Frederick avs. To be brick veneer and cost \$6,700.

George Bening, 714 21st av. has been awarded the general contract to erect a store and flat building at 30th av. and Lapham st. To be 24x58 and cost \$4,500.

August L. Naps, 917 29th st. has been awarded the general contract for building a duplex flat on Murray av., for a private party, costing \$4,500.

E. F. Martin, 709 35th st., has started work on a frame residence which he is erecting for himself on 51st st., near Pabst av., cost \$4,000.

Fred Korth, 994 Buffum st., has started work on a duplex flat which he is erecting for himself at Galena st., near 54th st. Cost \$5,500.

Otto Steuerwald, 684 41st st., has commenced work on a duplex flat on 54th st., near Pabst av. To be 24x52; builder is owner.

Charles Winter, 1425 Island av., has commenced work on a duplex frame structure on Louis av., near Center st.; costing \$3,000.

HEAD OF THE LAKES

Office: 206 Manhattan Building Telephone: Auto 3036.
Mail or telephone news not later than Wednesday.

DULUTH.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

P. Halverson, frame dwl., Michigan av. near Restormel....	2,000
Gary Building Co., concrete block dwl., 105th av. W.....	3,000
P. G. Hanson & Son, two frame dwls., W. 2d st.....	4,000
Thomas Rudd, frame dwl., 16th av., frame dwl.....	2,000
T. H. Reed, frame dwl., 16th av. E. near 6th.....	2,000
Zenith Investment Co., freight elevator, S. 1st av. E.....	1,165
O. E. Pederson, frame dwl., W. 8th st.....	1,500
Minneapolis Brewing Co., cold storage building, W. Michigan st.	5,000
P. Fosness, frame dwl., Morningside park.....	1,000
M. Grimsted, frame dwl., Morningside park.....	1,000
O. Hedberg, frame dwl., 39th av. W.....	1,500

The recent decision of the Island Creek Coal Co. to double the capacity of its Duluth dock is said to have been arrived at because of the necessity of storing larger stocks to take care of expanding trade in the west and to enable it to store further ahead of immediate requirements.

The December number of Public Affairs, a bulletin issued by the Commercial club, places emphasis on the fact that the \$20,000,000 plant of the Minnesota Steel Co., subsidiary of the United States steel corporation, is located in Duluth and not in any of its suburbs or neighboring towns; it's a big thing and Duluth naturally wants full credit for it.

The temporary structure to house the prisoners at the county and city joint work farm will be completed by the first of the year; it will accommodate 48 prisoners. Along with the house, a temporary barn and stable is being erected.

New construction in Duluth has set a gratifying record this year, and leaving out of consideration the \$10,000,000 permit issued three years ago to the Minnesota Steel Co.; it has already eclipsed the previous high mark set during that season.

C. S. Palmer is chairman of a committee to secure \$3,000 in pledges from Lester Park people and \$2,000 from other sources for a community house on the property on the Methodist church, 54th av. E. and Superior st.

New officers of Builders' Exchange: president, E. J. Zauft; vice presidents, D. R. Black and T. H. Heden; treasurer, R. D. Annis; sergeant-at-arms, William Fawcett; directors, A. W. King, J. R. Quigley and R. A. Webster.

Improvements amounting to \$2,400 are to be made on the heating and light equipment of the court house at once; C. L. Pillsbury, consulting engineer, Minneapolis; contracts have already been let.

Contract for the fireproof addition to the barn of the Bridgman-Russell Co. has been let to Fawcett & Bergstrom; Wagenstein & Giliuson, architects.

P. M. Olson, architect, has plans out for figures for a 2-story frame house for E. B. Selway at Woodland. Its cost is estimated at \$5,000.

The Oneota & Hazelwood Improvement club are urging the school board to enlarge the Merritt school house, 40th av. and West 5th st.

The West End Commercial club wants the Soo to establish a freight station in the West End.

SUPERIOR.

The council has adopted an ordinance prohibiting keeping swine within 200 yards of any public dairy, hospital, school house, church or other public institution, or within 100 yards of any inhabited residence district in the city.

The city engineer has been directed to make plans, estimates and surveys for the extension of Quebec pier to the harbor line.

John Donlin will build a strictly fireproof modern garage on 12th st., between Hammond and Ogden avs.; 50x140; cost \$12,000.

SEATTLE, WASH.

Notes Arranged Alphabetically by States.

BUILDING PERMITS.

Chas. E. Wilson, residence, 1715 S. L. (S. J. Smith).....	2,000
T. R. Hornschuch, bungalow, 1409 S. 12th (Geo. Rossman)	1,600
A. McConnell, 4229 Willow st., 1-story frame dwl.....	1,000
Isaac Stoen, 3511 N. 76th st., 1½-story frame dwl.....	2,200
J. L. Canasse, 2224 14th av. W., 1-story frame dwl.....	1,800
A. L. Walter, 4121 Interlake, 1-story frame dwl.....	2,200
Pacific Telephone & Telegraph Co., 1115 4th av., remodeling	6,500
Yukon Investment Co., 220-222 Occidental av., alterations.	12,000
American Mortgage & Building Co., 1207 E. 58th st., 2-story residence	3,500
Ft. Seattle Commission, 2329 Railroad av., finish structure	3,000
J. R. Van Emelen, 4519 Densmore av., 1-story residence...	1,600

DES MOINES, IOWA

Bert N. Mills, Representative, 310 Hubbard Building.

BUILDING PERMITS.

Mrs. C. E. Campbell, dwl., 811 Prospect av.....	7,000
B. W. Mayden, dwl., 738 36th st.....	2,300
S. Steele, dwl., 1011 29th st.....	2,800

Work on double tracking the Rock Island main line across Iowa is to start early in the spring according to an announcement by T. M. Schumacher, chairman of the board of directors, following an inspection of the Iowa lines. The line already is double tracked from Davenport to Iowa City and the remaining distance across the state is about 250 miles. It is estimated that the cost will be about \$35,000 per mile. E. J. Gibson, a track expert who came here recently from Texas to take charge of the Iowa division, will be in charge of the work. This improvement will go hand in hand with the building of new shops, yards, and terminals in East Des Moines.

Resolutions of necessity for 63 concrete bridges to cost at least \$100,000 were passed this week by the board of supervisors of Polk county of which Des Moines is the judicial seat; bonds will be issued. The work will begin early next spring. In accordance with the new road law, plans and specifications must be forwarded to the state highway commission and when the engineers of that commission have approved them the board will advertise for bids and proceed to award the contracts. The attorney general of Iowa, Geo. Cosson, has advised the board that there is nothing in the law to hinder the issuance of bonds for this purpose. Many of the new bridges will be located on the River-to-river road which is fast being put to permanent level in this county.

Plans for a bridge across Raccoon river at 7th st., with a viaduct over railroad tracks, were adopted this week by the city council. The total cost is to be \$185,500 distributed as follows: city, \$106,750; Great Western, \$25,000; Interurban Co., \$25,000; Des Moines Terminal Co., \$28,750; work is to begin when the state railroad commission orders the viaducts built.

Substantial buildings will be erected by the state of Iowa on the farm which will be purchased by the state board of control. The control board has been looking over prospective sites for the new farm and expects within a few days to decide, the board will then proceed to prepare plans for buildings.

Extensive improvements incident to the landscaping and beautifying of the state house grounds as contemplated by the state house extension bill passed by the last legislature will hinge upon a decision of the supreme court as to the validity of the law. The decision is expected within a few days.

The Des Moines school board and the city government are at war over the installation of smoke consumers in the schools. The city has threatened to stop work on the Park avenue school unless the school board agrees to install consumers as demanded.

Harry E. Throne of Ottumwa, architect and superintendent of construction, has moved his offices to Des Moines and will join J. Campbell Morrison in the business here. The new firm is Morrison & Throne, located in the Capital City Bank building.

City engineers this week approved plans for a new Methodist Institutional church which is to be built in South Des Moines at a cost of \$15,000. All Methodist congregations of the city will join in raising the money for the structure.

Bids for a new concrete bridge over Walnut creek on Grand av. were rejected by the city council because too high. The low bid was \$17,997 by the Reinking Co. and the high bid \$25,907. All were in excess of the city's estimates.

FARGO, NO. DAK.

Mail or telephone news not later than Wednesday.

Fargo is looking forward confidently to a new railway within the next year or two. The postoffice department has called for bids for carrying the mails to and from the stations there, the contract to be for 4 years. The bids are for carrying the mails from the postoffice to four stations, and as there are only three there at present, it is believed that the government has been notified that a 4th line is to be built within the contract period. Fargo believes that the new line will be the Soo which would either send a branch line across from some point in Otter Tail county or run a line across from Duluth.

Secretary Leiby of the Builders' & Traders' Exchange says the contracts of 1913 amount to \$1,684,000 and that prospects for 1914 are good. An unusual number of new court houses in North Dakota are under consideration. Mr. Leiby

thinks 1914 will be the state's biggest building year to date.

The chances for Fargo securing a branch packing plant are now regarded as favorable as a result of the investigation of conditions over the state by representatives of the company who found many beef cattle and thousands of hogs were raised in the state.

A municipal dance hall is proposed by Miss Irma Erwin, local policewoman. It also would be an amusement center. Several organizations have indorsed the idea.

City Engineer Anders entered into a detailed discussion of the advisability of water softening in the filtration process, in an interview published in The Forum.

The park board will probably build a toboggan slide in Island Park. Also a bath house on river front, next summer.

The Builders' & Traders' Exchange is preparing for its annual banquet.

☞ OMAHA, NEB. ☞

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

J. B. Kaogh, 2824 S. 32d, frame dwl.....	2,500
O. F. Nelson, 3225 Hamilton, frame dwl.....	4,000
Hans Nelson, 3304 Vinton, frame dwl.....	1,000
D. H. Bratche, 5016 Florence boul., frame dwl.....	2,500
J. B. Kaogh, 2824 S. 32d, frame dwl.....	3,500
O. T. Nelson, 3225 Hamilton, frame dwl.....	4,000
Hans Nelson, 3304 Vinton, frame dwl.....	2,000
Chas. Carlson, 3439 Webster, frame dwl.....	2,500
G. F. Epeneter, 2709 Cumming st., brick dwl.....	3,300

Alex Beck has contract to build a new cornice factory for G. F. Epeneter, at 2709 Cummings st., steel and brick, 66x88.

The Turin Elevator Co., incorporated; capital \$12,500, John K. Brown, president, W. D. Moore, vice president, J. L. Rhinehart, secretary.

The Boyd theater will be turned into either a vaudeville or a tabloid musical comedy house, according to plans by Mayor Frank Zehrung of Lincoln, building to be remodeled and renovated throughout.

T. R. Kimball, Omaha, was elected first vice president of the American Institute of Architects, R. C. Stuart, of Boston, president, D. Knickerknocker Boyd of Philadelphia, secretary.

More plans for the proposed erection of the \$40,000 gymnasium for the Creighton university by subscription have been made.

Work of erecting a home for working girls will begin soon, incorporated under name of John S. Creighton.

Fire damaged the old lodge hall at NE. corner 24th and Charles st., about \$1,500.

☞ WINNIPEG, MAN. ☞

The sub-contracts have been awarded for the Quebec Bank and office building on Portage av. Brown & Vallance, 1006 McArthur building are the architects, and the general contractors are Carter-Halls-Aldinger Co., Union Bank building. The following are the successful tenderers: steel, Dominion Bridge Co., Canada building; marble and tile, Marble & Tile Co. of Canada, St. Jean Baptiste la Verandrye, Winnipeg; mill work, Aaron Carlson, Minneapolis, Minn.; granite, Stanstead Quarries Co., Quebec; metal sash, Hope Sash Co., 45 King st. W., Toronto; elevators, electric work, heating and plumbing contracts are not yet let.

The following permits were issued here: J. A. Johnson, two dwellings, Sherburn st., \$4,800; D. Ackland & Sons, warehouse, Higgins av., \$1,500; A. Dunlop, dwelling, McDermot av., \$4,000; J. A. Durnell, dwelling, Borebank st., \$3,500; Pollock Bros. dwelling, Matheson av., \$4,000; J. Pound, dwelling, Camden Place, \$2,700; A. W. King, dwelling, Jessie av. \$3,000; Rev. C. W. Gordon, brick garage, Assinaboine av., \$2,000; J. Peterson, dwelling, Harbison av., \$2,500; J. Daun, alterations to apartment block Main st., \$7,000; Canadian Paint Co., steel water tower, Sutherland av., \$2,000.

The St. Mary's Roman Catholic church will start the building of a church of about \$500,000, on Broadway on Mar. 1. This will include two schools. The site has been already purchased and will be cleared as soon as possible. Plans are already being prepared, and the church will be one of the largest in Canada. A smaller church will be built down town somewhere in the vicinity of Donald st. by the same congregation to serve the down town district.

The following permits were issued: G. Watt, dwelling, Ingersoll st., \$2,400; J. M. McKinley, dwelling, Garfield av., \$2,000; D. Rosen & Co., dwelling, Alfred av., \$3,000; M. Mogalesky, dwelling, Harbison av., \$2,500; Hancox Land & Building Co., two dwellings, Clifton st., \$6,000; Jno. Martino, dwelling, north side of Magnus between Sinclair and Artillery sts.; cost \$1,600.

Residences to cost \$200,000 are being contemplated by a syndicate, who will also be the architects and general contractors of the project. C. W. N. Kennedy, Kennedy building, is interested in the proposition. The houses to be erected are to cost from \$1,500 to \$2,000 each, and it is intended to build 102 in 1914 and the other 102 before 1916.

*Many by-laws are being voted upon—\$1,000,000 for extensions of hydro-electric system; \$275,000 for Winnipeg General hospital; \$100,000 for Civic hospital for infectious diseases; \$110,000 for public parks; \$85,000 for garbage destroyer; \$60,000 for two new fire stations; \$50,000 for public comfort stations.

*The following permits were issued: S. Hafladason, dwelling, Garfield av., \$2,000; F. Kristjanson, dwelling, Alverstone st., \$3,000; S. Cohen, foundation for apartment block, Jessie st., \$5,000; J. J. Leverton, dwelling, Alfred av., \$2,000.

*City will construct granolithic sidewalks, plank walks, concrete pavements and boulevarding, for which tenders are to be called. C. J. Brown, city clerk.

The total number of permits taken out during 1913 to Dec. 1, in Winnipeg were 3,974, with a total cost for the eleven months of \$18,116,790.

The Bitulithic Paving Co. of Winnipeg secured the contract to pave 7 miles of roadway on Portage av. for municipality of Assinaboia.

The Siemens Co. of Canada, were awarded the contract for motor generator for \$9,740, to be installed on King st. power sub-station.

J. T. Hanna, H. Rogers, E. Webb and J. Fulsher of Winnipeg, will have residences erected at Parkdale suburb in the spring.

G. A. Graham has taken out a permit to erect a theater on Main st. between Matheson and Lansdowne av., cost \$4,800.

Henry Rogers and the traders' and labor council, Winnipeg, are to erect large number of cottages next spring.

A "Booster" pump is being considered for Ft. Rouge, to be situated on S. Assinaboine river.

*E. Rochon, proprietor, Leland hotel, will rebuild after fire; new plans; cost over \$150,000.

STREET AND ROAD WORK

Notes Arranged Alphabetically by States.

Alta., Calgary—Council will call special election to vote \$98,000 for a subway on 4th st.; J. M. Miller, clerk.

Alta., Medicine Hat—Plans drawn for subway on Esplanade st. to cost \$52,303, to be completed by July, 1914; A. K. Grimmer, engineer; H. Baker, clerk.

Alta., Medicine Hat—Citizens voted to issue bonds for \$50,000 for grading and graveling streets; H. B. Baker, city clerk.

B. C., Vancouver—Plans completed for following paving work by city engineer, and active work will be begun soon after first of year: Cypress st., asphalt and granitoid, \$22,000; Prince Edward st., asphaltic, \$17,000; Venables st., asphalt and brick, \$30,000; Venables st., from Campbell to Vernon, asphaltic, \$44,000; Campbell av., wood block, \$5,000; Fir st., asphaltic \$9,500; 13th av., asphaltic, \$16,000; 11th av., asphaltic, \$30,000; total \$171,000.

Iowa, Belle Plaine—Bids received by W. M. Ewen, city clerk, until 3 p. m., Jan. 5 for 55,718 square yards of paving, and 13,570 feet of cement curb and all appurtenances. Work in six divisions; \$500 check required for each division. Private plans and specifications will be furnished by the engineer for \$5; Iowa Engineering Co., engineers, Clinton, Iowa.

Iowa, Cedar Rapids—A resolution of necessity which will be further considered at the January meeting of the city council has been passed relative to paving on a large number of streets, the paving to be of vitrified brick, concrete, sheet asphalt, asphaltic concrete, creosoted wood blocks, bitulithic, dollarway or tarvia, the one or more materials to be laid on a five-inch concrete foundation; address the city clerk.

Iowa, Des Moines—The paving of seven blocks on Wooland av. has been ordered by the council in spite of a dozen protests; Horace Snsong, city clerk.

Iowa, Dubuque—At its next session the county board will go on record to raise its part of the \$60,000 required in order to secure the \$30,000 which the federal government will give for good roads in Dubuque county; Theo. Scharle, county auditor.

Iowa, Iowa City—Road grading equipment will be purchased by Johnson county board of supervisors at its next meeting; address county auditor.

Iowa, Nevada—The city council has adopted a resolution ordering paving from depot to depot on Linn st., 5th av. and Pine st.; the material to be reinforced concrete, bitumen-coated concrete, asphaltic concrete with concrete base, or brick with concrete base; the council will not accept repre-

PROPOSAL ADVERTISING FOR BIDS

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RATE FOR NOTICES in this department—15c per line each insertion. No discounts allowed. Several insertions are customary to insure full and fair competition.

PRINTED SLIPS are furnished to officials, architects and others interested, for distribution by them, without extra charge.

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COPY RECEIVED up to Friday, 10 a. m., will be published in the paper, delivered to subscribers on Saturday, but should reach the publication office, Lumber Exchange, Minneapolis, earlier in the week, when possible.

LATE NOTICES Friday morning can be transmitted by long distance telephone.

NOTICE TO BIDDERS.

Sealed bids will be received by the Board of Education at Foley, Minnesota, until 2:00 P. M., Friday, December 19th, 1913, for the erection of a two-story, brick addition to the present high school building.

Plans and specifications can be seen at the Builders' Exchange, in both Minneapolis and St. Paul, Minnesota, and the same may be obtained from the Architect, Rolland C. Buckley, St. Cloud, Minnesota, upon payment of ten dollars (\$10.00.) This amount to be refunded when the plans are returned.

Separate bids will be received on the following:

- (A) General Construction,
- (B) Heating and Ventilating,
- (C) Plumbing.

Each bid must be accompanied by a certified check of 5 per cent of the amount of bid. All checks to be made payable to Mr. C. F. Callahan, Secretary of the Board of Education of Foley, Minnesota.

The Board reserves the right to reject any and all bids.

Bids to be opened at 2:00 P. M. on Friday, December 19th, 1913. Dated November 19th, 1913.

MR. C. F. CALLAHAN,
Secretary of the Board,
of Education,
Foley, Minnesota.

(Continued on Page 24.)

PROFESSIONAL DIRECTORY

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sentations made by interested parties until fully verified by its own investigations; R. A. Davis, city clerk.

Iowa, Sac City—Twenty-five blocks of paving ordered by city clerk.

Iowa, Storm Lake—Commercial club has passed resolution favoring paving business section of city early as possible next season; address city clerk.

Kan., Lindsborg—Curbing and guttering for 3 or 4 miles is being considered; Andrew Monson, city clerk.

La., Lake Charles—Contracts for paving have been let as follows: Kaw Paving Co., Kansas City, Mo., 19,538 square yards; Richie Bros., Wichita, Kan., 20,000 square yards; R. M. Hyams, New Orleans, La., 14,000 square yards. E. L. Gorham, city engineer.

Minn., Brainerd—Council will submit bond issue for \$22,000 for a fill to replace Northeast bridge; election Jan. 6; address city clerk.

Minn., Eveleth—Farmers south will petition for five or six miles of road, to be supported by the public affairs committee of the Commercial club; address county auditor.

Minn., Northfield—Street committee estimated cost of paving business section on east side would be \$10,300, this to include storm sewers, curbing, needed, etc.; address city clerk.

Minn., Rochester—The city engineer has been instructed to prepare plans for the paving of 5th st., from Cascade road to Central av., and also for Dubuque st.; petitions are about ready to be filed; Thos. Sullivan, city clerk.

Minn., St. Cloud—A petition is being generally signed asking that a portion of East St. Germain st. be paved with granite blocks. G. G. Magnuson, city clerk.

Minn., St. Paul—Estimates for entire paving job on Marshall av., from Grotto st. to Asbury av., and from Snelling av. to Mississippi river, have been submitted by Oscar Claussen, city engineer as follows: sandlime brick, \$299,629.93, or \$9.91 a front foot; granite blocks, \$294,537.07, front foot, \$9.74; sandstone, \$260,584.67, front foot \$8.52; 3½-inch creosoted blocks, \$229,178.70, front foot \$7.58; brick, \$190,982.25, front foot \$6.32; asphalt, \$182,342.96, front foot \$6.06; asphaltic concrete, \$167,225.67, front foot \$5.53; asphaltic macadam, \$139,204.84, front foot \$4.61; macadam, \$117,984.59, front foot \$3.90. Where curbing has not been put in an additional 44c a front foot is added for cement curbing. Sewer, water and gas service will entail additional cost.

Minn., St. Paul—Bids received by Leonard C. Seamer, clerk board public works, until 2 p. m., Dec. 18, for the grading of Hewitt av.; also, at same time, for grading Topping st.; also, at same time, for grading Syndicate av.; also Hubbard st., and also a certain alley in the Hamline-Syndicate addition; checks for 10 per cent in each case.

Minn., St. Paul—Except for block between Lexington av. and Dunlap st. where the grade is too steep to permit use of blocks, Selby av. from Victoria to Herschel will be paved with creosoted blocks, according to decision reached by the board of public works; engineer estimates cost at \$74,908, and cost to property owners at \$4.78 a front foot.

Minn., St. Paul—On the protest of citizens, the paving of Marshall av. has been held up until the sewer work in part of the thoroughfare has been definitely settled; Oscar Claussen, city engineer, is preparing information regarding the sewer situation.

Minn., Virginia—The residents of West Virginia want a board walk laid to their section, one and one-half miles from the city proper; A. E. Bickford, city clerk.

Minn., Winona—A petition will be presented to the council for the paving of Broadway between Main and Harriet, and the sentiment favors either brick or creosoted blocks; G. W. Hoffman, city clerk.

Mo., Kansas City—Bids received by county clerk, until Dec. 10, for macadamizing the Blue Ridge boulevard a distance of 5.75 miles; also for grading and macadamizing the road from Oak Grove to Sni Mills, a distance of 4.2 miles.

Mont., Fort Benton—A. L. Jaqueth, engineer, Kalispell, estimates the cost of street improvements in district No. 1 at about \$62,000, and in district No. 2 at about \$47,000; the improvements are generally favored; address the city clerk.

Mont., Great Falls—Hearing Dec. 22, on grading 11th st. at cost of \$1,800; also, at same time, for grading of 9th st. and 10th av.; W. H. Harrison, city clerk.

Neb., Kearney—Bids will be called for at once for the paving of 1st av. and 21st st. with brick; Eugene Morey, engineer.

Neb., Kearney—It is announced that the contract for the paving of 1st av. will soon be advertised for; plans and specifications call for vitrified brick paving with an asphalt filler, to be laid on a four-inch concrete base; Eugene Morey, city engineer, and T. N. Hartzell, city clerk.

Neb., Lincoln—Paving districts Nos. 284 and 285 have been created. The Union Pacific has agreed to pave eWst P. st., from the viaduct to the city limits.

Neb., Nebraska City—Plans for paving N. 10th st. being prepared by Chas. A. Shannon, city engineer.

Neb., Omaha—Bids received by Thomas J. Flynn, city clerk,

until 9 a. m., Dec. 23, for improvement of certain streets and alley; check for 5 per cent.

Neb., Omaha—Bids received by Thos. J. Flynn, city clerk, until 9 a. m., Dec. 16, for paving and curbing certain streets and alleys with either asphalt, stone, vitrified brick, vitrified brick block, artificial stone, macadam, creosoted wood block, asphaltic concrete, or vertical fibre crib; check for 5 per cent on some bank.

Ore., Portland—Bids for improvement of Broadway were as follows: vitrified brick: Jeffery & Bufton, \$13,016; Jas. Kennedy Construction Co., \$12,880; Barber Asphalt Paving Co., \$17,555. Asphalt: Oregon Ind. Paving Co., \$9,847; Barber Asphalt Paving Co., \$8,588. Bitulithic, concrete base: Warren Construction Co., \$10,531; Barber Asphalt Paving Co., \$9,740.

Ore., Portland—Contracts with G. B. Daniels for paving Wall st. with concrete at \$15,331; with Giebish & Joplin for paving Knott st. with concrete at \$10,195; and with T. A. Sweeney for grading and concrete walks and curbs on Emerald st., at \$6,067.

Ore., Portland—Road work voted by commissioners of Multnomah county amounting to \$830,000, including grading, paving and bridges; address county auditor.

Sask., Estevan—Council contemplates sidewalks on 14 different streets; P. J. Stephens, secretary-treasurer.

Sask., Regina—Council contemplates subway on Winnipeg st. to cost \$50,000; plans prepared this winter and work to be begun in spring; F. McArthur, city engineer; A. L. Thornton, commissioner.

Sask., Regina—Contract made with the Lumber Manufacturers' Yards, Ltd., for lumber at \$9,908; also, to R. Fleming, for 7 miles of plank sidewalks at \$3,296.

Sask., Saskatoon—City council will purchase two street cleaners and mud scrapers, and two street cleaning water pressure machines.

Texas, Hillsboro—Citizens voted bonds for \$250,000 for county roads in Hill county; address county auditor.

Texas, Huntsville—Citizens voted bonds for \$150,000 for roads in Walker county; address county auditor.

Wash., Olympia—Of \$1,750,000 available for road construction during the biennium, commission has already let contracts for \$168,000 and bids have been called on six other pieces of work at \$21,000.

Wash., Port Angeles—Bids received by C. E. Shields, city clerk about Dec. 25 for grading, piling and curbing Front, 1st, Oak, Laurel and Lincoln sts. and Railroad av., at estimated cost of \$170,000; C. J. Fillion, city engineer.

Wash., Olympia—Bids received by W. J. Roberts, secretary of the highway board, until 2 p. m., Dec. 22, for clearing, grading and draining about 1.75 miles of the Pacific highway from

Wash., Olympia—Bids received by state highway commission at Columbia, J. W. Roberts, secretary, for 7.3 miles of Sunset highway between Wenatchee and Waterville, and 1.75 miles of Pacific highway south of Toledo.

Wash., Seattle—Plans and specifications completed by A. H. Dimock, city engineer, for grading, curbing and constructing walks on Delmar drive, cost \$13,000; concrete walks on 10th av. NE., etc.; cost about \$20,000.

Wis., Lake Geneva—Council voted to pave 6 blocks with creosoted wood blocks, 64 feet wide; address city clerk.

Wis., Richland Center—Members of the county board selected to buy highway machinery are John Koch, J. M. Caldwell and Chas. Beebe. The clerk of the board is W. A. Lawton, Richland Center.

Wis., Washburn—At recent annual meeting of county board the central route was decided upon for location of the direct highway system from the eastern to the western line of Bayfield county; Elmer S. Hall, county clerk.

CONTRACTS AWARDED.

Mo., Kansas City—Contract for the first and second sections of the Sni-a-bar road let to Davidson Bros. at \$21,580.

Mont., Bozeman—Contract made with S. Birch & Co. for cement walk on College st., improvement, about 15,000 square feet.

Mont., Great Falls—Contract to Joseph Herring for boulevards, etc., on 6th st., south from 5th av. to 10th av., at \$2,523; other bids were Nilson-Smith at \$2,689, and the Evans Co. at \$2,826.

N. D., Bismarck—Contract has been made with the Haggart Construction Co., Fargo, N. D., for grading 7th st., at 75c per square yard; the bid of M. P. Moore, city, was 80c.

Wash., Olympia—Contracts for four highways have been let by the state highway commission as follows: Sunset highway, from Reardan to Davenport, 13 miles, \$39,250, to Henry Styles of Tacoma; Sunset highway, from Davenport westerly 4.2 miles, \$18,700, to Henry Styles of Tacoma; Sunset highway, Wenatchee northeasterly in Douglas county, 6.2 miles, \$26,968, to Rajotte & Robert of Seattle; Pacific highway, Blaine to Custer, 5.5 miles, \$36,968, to L. H. Goerig of Seattle.

(Additional Street and Road Work news page 45.)

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PROPOSAL ADVERTISING FOR BIDS.

TELEPHONE SYSTEM AND WATCHMAN'S CLOCK SYSTEM FOR ROCHESTER STATE HOSPITAL, ROCHESTER, MINNESOTA.

Sealed proposals will be received by the State Board of Control at their office, in the State Capitol building, St. Paul, Minn., until 2 P. M., Wednesday, December 17th, 1913, for telephone system and watchman's clock system, Rochester State Hospital, Rochester, Minnesota, in accordance with the plans and specifications of Charles L. Pillsbury Co., Engineers, 805-811 Metropolitan Life Building, Minneapolis.

Bids are to be submitted only on forms supplied by the Engineers. No other form of bid will be considered. Bids are to be accompanied by certified check for five per cent of the amount of bid, payable to the State Board of Control, which check will be returned when contract is executed.

Copies of the above plans and specifications may be seen at the Superintendent's office, State Hospital, Rochester, at the Builders' Exchange, Minneapolis, at the Builders' Exchange, St. Paul, at the office of the Board of Control, and at the office of the Engineers. Extra copies of plans and specifications may be obtained on application to the Engineers on payment of cost of duplication. Successful bidder must furnish the Board with a surety bond in 75 per cent of amount of contract. The right is reserved to accept or reject any or all bids.

PROPOSALS WANTED.

Jail and Sheriff's Residence, Carlton, Minn.

Sealed proposals will be received by the County Board of Commissioners, Carlton County, Minnesota, August R. Norman, County Auditor, for the erection and completion of a Two-Story Jail

and Sheriff's Residence to be erected at Carlton, Minnesota, according to plans, specifications and details as prepared by the Architects, Vernon J. Price & Company. Said proposals to include separate bids on General Contract, Plumbing, Heating, Wiring and Cell Work. Sealed proposals on the above work will be opened by the County Board of Commissioners, at Carlton, Minnesota, at 10 o'clock on Jan. 6, 1914. A certified check shall accompany each bid, made out to the order of William Gallagher, County Treasurer. Said certified checks to be of the following amount as covered by each part of the work:

General Contract	3% of Bid
Cell Work	5% of Bid
Plumbing	10% of Bid
Heating	10% of Bid
Wiring	5% of Bid

Plans and specifications are on file at the office of August R. Norman, County Auditor, Carlton, Minnesota, and at the offices of the Architects, Vernon J. Price & Co., 608 Palladio Building, Duluth, Minn., or Rexall Block, Crosby, Minn. Separate copies of plans, specifications and details for personal use may be had upon application to the architects, accompanied by a check of \$10, which will be returned to bidder when plans are returned.

The right to reject any of said bids is reserved by the County.

By order of County Board, Carlton, County, Minn.

By AUGUST R. NORMAN,
County Auditor,
Carlton, Minn.

ELECTRICAL CONSTRUCTION FOR POWER PLANT ROCHESTER STATE HOSPITAL, ROCHESTER, MINNESOTA.

Sealed proposals will be received by the State Board of Control at their

office, in the State Capitol Building, St. Paul, Minn., until 2 P. M., Wednesday, December 17th, 1913, for electrical construction for power plant, Rochester State Hospital, Rochester, Minnesota, in accordance with the plans and specifications of Charles L. Pillsbury Co., Engineers, 805-811 Metropolitan Life building, Minneapolis.

Bids are to be submitted only on forms supplied by the Engineers. No other form of bid will be considered. Bids are to be accompanied by certified check for five per cent of the amount of bid, payable to the State Board of Control, which check will be returned when contract is executed.

Copies of the above plans and specifications may be seen at the Superintendent's office, State Hospital, Rochester, at the Builders' Exchange, Minneapolis, at the Builders' Exchange, St. Paul, at the office of the Board of Control, and at the office of the Engineers. Extra copies of plans and specifications may be obtained on application to the Engineers on payment of cost of duplication. Successful bidder must furnish the Board with a surety bond in 75 per cent of amount of contract. The right is reserved to accept or reject any or all bids.

WANTED—PLANS FOR WELL.

The Water Works Committee of the City Council of Eagle Grove, Iowa, want to correspond with an architect of experience in plans and specifications for digging a well 16 feet in diameter and about 60 feet deep, curbing to be of rock; also giving estimate of cost of same.

Address SAM MIDDLETON,
City Clerk,
Eagle Grove, Iowa.

(Continued on page 26.)



SEND US YOUR PLANS
Our figures cost nothing, and
YOU WILL SAVE MONEY

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You Can Buy the Best Sheet Metal Work

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Ventilators, Gutters, Ridgings, etc., etc.,

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and Ornament Co.
ST. PAUL, MINN.

SEWERS

Notes Arranged Alphabetically by States.

Alta., Ogden—The council has appropriated \$150,000 for sewers.

B. C., Victoria—Repairs are to be made to the Oxford sewer, to be of brick, and to cost about \$30,000.

Colo., Denver—Council considering an ordinance providing for sub-storm sewer in Washington park district to cost \$30,000, and for sanitary sewer in West and South side district to cost \$900,000; A. L. Fellows, city engineer.

Iowa, Montezuma—Hearing Dec. 26 on a large amount of sewer work; R. A. Mortland, clerk.

Iowa, Ottumwa—The Washington street sewer is to be constructed; M. L. Byrne, city clerk.

Kan., Atchison—Reported bids will be received until Jan. 1, for 4,000 feet of 6, 8 and 10-inch sewer; F. S. Altman, city engineer, and V. L. King, city clerk.

Man., Winnipeg—Bids will soon be called for on a large number of sewers; C. J. Brown, city clerk.

Minn., St. Paul—Bids received by Leonard C. Seamer, clerk board of public works, until 2 p. m., Dec. 22, for sewers on Fairmount av., St. Clair st., Princeton av., Mississippi River boul., Woodlawn, Cleveland, Cretin and Lincoln avs.; check for 10 per cent.

Minn., St. Paul—Bids received by Leonard C. Seamer, clerk board of public works, until 2 p. m., Dec. 18, for sewer on Orleans st.; also at same time, for a sewer on Marlboro av.; also, at same time, for a sewer on Page st.; check in each case for 20 per cent.

Mont., Fort Benton—Estimates for proposed sewer work made by Mr. Jaqueth, engineer, Kalispell, gives cost for sanitary sewer at \$23,000 and of storm sewer at \$8,000.

Mont., Great Falls—Bids received by W. H. Harrison, city clerk, until 8 p. m., Dec. 15, for an 8-inch sanitary sewer in 6th alley; check for 10 per cent.

Mont., Harlowtown—A 16-inch trunk and 12-inch laterals are contemplated in a sewer system which is under discussion by the city council; definite action is expected in the near future.

Neb., Norfolk—Bids received by P. F. Stafford, city clerk, until 5 p. m., Dec. 15, for a sanitary sewer in district 40; check for 5 per cent.

Neb., Omaha—Officials considering connection with local Mud Creek sewer, cost of which is estimated at \$75,000; T. J. Flynn, city clerk.

Neb., Omaha—Bids received by Frank Dewey, clerk, Douglas county, until noon, Dec. 31, for furnishing sewer pipe for the year 1914; check for \$50.

Neb., Omaha—Negotiations started for a sewer for a large section of southwest Omaha; an outlet will be sought through south Omaha system; address city clerk.

Neb., Ravenna—A 12-inch trunk sewer is planned from Bedke hill to the South Loup river at estimated cost of \$6,000; address city clerk.

Neb., Red Cloud—It is reported that the sewer bond proposition, recently defeated, will be resubmitted; O. C. Tell, city clerk.

Ore., Salem—Bids will be called for early next year for sewers amounting to nearly half a million dollars; address city clerk.

Ore., St. Johns—City engineer instructed to prepare plans for sewer system in South St. Johns to empty into Willamette river.

Texas, Houston—According to estimates by E. S. Sands, city engineer, more than half a million dollars' worth of storm sewers will be constructed here within the next eighteen months; work is now ready amounting to about \$58,500.

Wash., Puyallup—Plans and specifications for a storm sewer on 7th av. SW., and on Meriden st. north to the river passed by council and bids will be advertised for; address city clerk.

Wis., Beloit—Plans have been submitted by City Engineer Caldwell for a storm sewer on the west side requiring 11,150 feet of sewer and costing about \$65,000. The engineer directed to make similar report on the east side, which will cost as much more; address city clerk.

Wis., Fond du Lac—Bids will be asked for about Feb. 15 for 1.5 miles of 8 to 18-inch vitrified pipe sewer; J. S. McCullough, city engineer; J. F. Hohensee, city clerk.

Wis., Oshkosh—Petitions presented for several sewers; address, city clerk.

Wis., Wales—Sewage disposal plant for the Wales sanitarium will be rebuilt by the state board of control; Wm. G. Kirchoffer, engineer, Madison, Wis.; M. J. Tappin, secretary, capitol building, Madison.

Wyo., Ft. Yellowstone—Bids for an outfall sewer rejected; will be readvertised next year; address quartermaster.

CONTRACTS AWARDED.

Iowa, Dubuque—Contract for the storm sewer on W. 5th st. has been given to Wilmer Cook, 1699 Washington st.

Iowa, Lehigh—Contract with Benson & Reed, Fort Dodge, Iowa, for sanitary sewer 3,677 feet long, much of it through solid rock, at \$4,011.

Kan., Salina—Contract with Otto Peterson for extension of Ash st. sewer at \$13,160; monolithic concrete pipe, 36-inch in diameter, including man holes; other bidders were Salina Plumbing Co., \$15,500; D. G. Stack, Salina, \$17,916; Everett & Burke, \$25,110.

Minn., Littlefork—Contract with Mr. Niles of International Falls, for sewer from school house to river; has a carload of tile on hand.

Minn., Stillwater—Contract to McGee & Nolan, city, for sewer work at \$8,658. Other bidders were Pastoret Construction Co., Duluth, \$9,289; Kircher Bros., St. Paul, Minn., \$9,864; Fraser & Danforth, \$9,260. Lewis W. Clarke, city engineer.

Mo., Carthage—Contract with Frank I. Taylor for sewer district 20, at from 38c to \$1.65 a cubic yard, totaling about \$1,800; to be completed by March 15.

Neb., Hastings—Contract with E. R. Ring for sewer work in district 68, \$4,148; other bidders were: C. J. Burke & Co., Kearney, \$4,400; A. A. Dobson Co., Lincoln, \$4,470; A. J. Van Every Hastings, \$4,586; Clarence Young, city, \$4,605.

Sask., Assinaboia—Contract has been given Dominion Construction Co., Winnipeg, for sewer work amounting to \$9,800; also, to the Galbraith Co., Winnipeg, to the amount of \$24,000.

S. D., Sioux City—Contract with Ferris & Son for all sewer connections on Philips av. and bond for \$500 accepted.

Texas, Houston—Contract with David Bros. for storm sewer with laterals, on Fletcher and Hogan sts., etc., at \$11,463; also, with Horton & Horton for extension of Austin st. storm sewer at \$28,798.

Wash., Seattle—Contract made with N. Fiorito & Bros. for Queen Anne st. sewer at \$5,377, and with Colosurdo & Co., in West Seattle at \$10,767.

Wash., Seattle—Contract with Atlas Construction Co., Everett, Wash., for sewers in West Atlantic st., at \$25,589.

Wis., Sheboygan—Contract to Chas. A. Honold, city, for 420 feet d. s. 18-inch vitrified pipe, man-holes at \$40, in Ontario st.

Wis., New London—Contract with Matt Nesbitt, city, for Coffin st. sewer; 10-inch pipe, 66c; 8-inch 70c; 10-inch Y branches, 70c; 8-inch Y branches, 50c; flush tanks, \$40; man holes, \$40; catch basins, \$40; house connections 56c.

BRIDGES

Notes Arranged Alphabetically by States.

Alta., Calgary—Thos. H. Mawson, Calgary's city planner and the city engineer are making plans for a bridge across the Bow river.

Alta., Edmonton—Provincial government and city are contemplating bridge cross Saskatchewan av.; J. Stocks, department of public works.

Alta., Edmonton—Contract for bridge on Wentworth st. awarded to National Paving Co., \$10,000; A. J. Laternel, engineer.

B. C., Kamloops—Canadian Pacific road has been authorized to construct bridge No. 32 at Lorne st.

Idaho, Caldwell—Fred McConnell, city engineer, has been instructed by council to investigate and decide what kind of bridges should be constructed by Pioneer irrigation district across Cleveland boulevard and Liner st.

Iowa, Council Bluffs—Commercial Club and West Council Bluffs Improvement Club have taken up the proposition of a bridge across Missouri river, between here and Omaha. Alderman Boyer, interested.

Iowa, Council Bluffs—Resolutions of necessity for three bridges, ranging in cost from \$450 to \$1,000 were passed by the board of supervisors. An 80-foot steel bridge will be located in Hazel Dell township near Weston, and two wooden bridges one 80 and one 60 in Hardin township.

Iowa, Des Moines—County board resolved to construct 63 bridges. Objections Dec. 15. H. B. Frase, county auditor.

Iowa, Des Moines—Lowest bid for construction of concrete bridge over Walnut creek on the Grand av. road near Valley Junction was \$17,997, by Reinking Co., this exceeds all estimates by \$2,000; high bid \$25,907. The question is now whether the city can afford to erect a concrete bridge or a steel bridge which would cost \$8,000.

Iowa, Des Moines—Plans for a bridge over the Raccoon river were adopted by the city council, cost \$185,500, distributed as follows, city \$106,750; Great Western, \$25,000, Interurban Co., \$25,000 Des Moines Terminal Co., \$28,750; work to begin when the state railroad commission orders the viaduct built.

Iowa, Keokuk—Senator Cummings has introduced a bill

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Surety and Fidelity Bonds.**

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THE LARGEST AGENCY OF ITS KIND
IN THE NORTHWEST

More than 50,000 personal
injury cases handled for
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MINNEAPOLIS

PROPOSAL ADVERTISING FOR BIDS.

MOODY COUNTY COURT HOUSE.

Flandreau, S. D.

Sealed proposals, directed to Mr. G. A. Chorpeneing, County Auditor, Flandreau, S. D., and endorsed, "Court House" will be received on or before the 6th day of January, 1914, at 2 o'clock P. M., for all labor and material required in the erection and completion of a stone, three-story, fireproof Court House, according to plans and specifications prepared by Joseph Schwarz, architect, Sioux Falls, S. D. Said bids will be opened at the first above mentioned time and place, by the Commissioners of Moody County, S. D.,

who reserve the right to reject any and all bids.

Each bid is to be accompanied by a certified check of a sum equal to 2 per cent of the amount of the proposal, made payable to Edgar A. Hornby, Treasurer.

Copies of the plans and specifications are on file at the Builders' Exchange in St. Paul and Minneapolis, Minn., while a limited number may be obtained, upon a deposit of \$20.00, from the County Auditor by general contractors, the same to be returned within 10 days after they are loaned, when the deposit money will be returned.

Contractors desiring the loan of a set

of plans, for their own use and for the purpose of estimating only, can procure them from the architect, upon a deposit of \$20.00. Said plans shall be returned to the architect, at the time of letting, whereupon one-half of the deposit will be refunded.

GEO. A. CHORPENING,
County Auditor,
Flandreau, S. D.

BID FOR JAIL WORK.

The undersigned hereby gives notice that sealed proposals for the erection and completion of the jail cells, corridors and doors for the jail department of the municipal building, Aberdeen, S. D., including all labor and materials, will be received by Geo. F. Fossum at his office until the hour of 10 A. M., on the fifth day of January, 1914.

All bids must be in strict accordance with the plans and specifications, prepared by Geo. F. Fossum, Architect, of Aberdeen, S. D.

A certified check for 4 per cent of the bid, payable to the order of the City Treasurer, must accompany each bid as a guaranty, the same to be returned to unsuccessful bidders immediately on letting contract. The party to whom the contract is awarded will be required to give a satisfactory bond in the sum of the full amount of the bid for the faithful performance of the contract. The right is reserved to reject any or all bids.

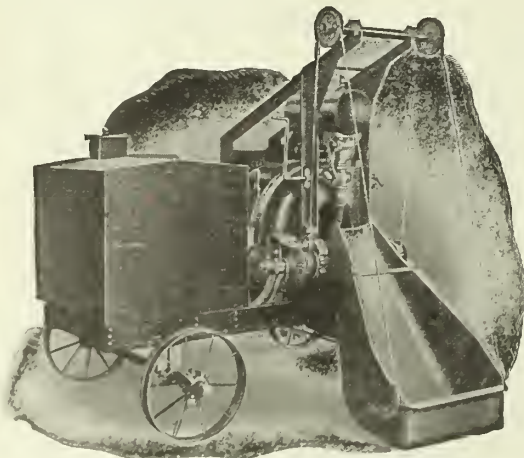
Signed F. W. RAYMOND,
City Auditor.

Dec. 1, 1913.

(Continued on page 28.)

Mixer Facts

Every Purchaser of Concrete Mixers Should Know the Importance of Thorough and Rapid Mixing, and the Durability of the Mixer.



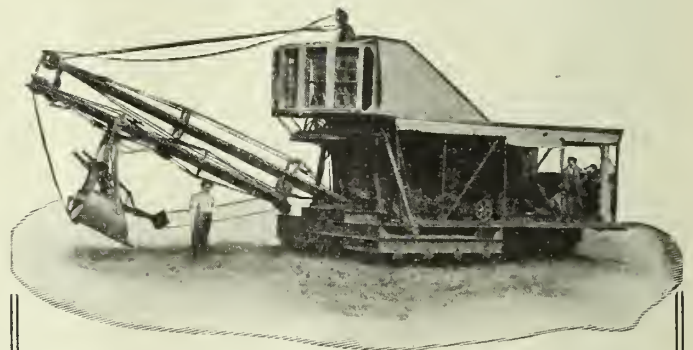
THE KOEHRING MIXER

has three Independent Mixing Actions. The Elevating Charging Bucket is the most efficient. Common Sense Construction and strongest built throughout.

Send for handsome booklet, explaining fully.

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IRRIGATION OR DRAINAGE DITCHES

Travels under own power on three large caterpillars having 100 square feet of bearing surface on the soil.

Weight per square foot on the ground is 23 per cent less than the weight under the average man's foot.

Will sustain its weight in the softest marshes, turn a right angle, go forward or back, climb a 25 per cent grade, load on car with own power, and is not too wide to cross country highway bridges.

EQUIPMENT

4-Cylinder Engine	24 Foot Boom
Caterpillar Tractors	1 Yard Dipper
Stump Puller	
-:- Electric Light with Auxiliary Engine -:-	

Two Machines Ready For Immediate Delivery
If this is interesting write to us for further particulars

DIX MACHINE CO., Stillwater, Minn.

at Washington, authorizing the Inter-Bridge Co. to build a bridge over the Mississippi between Keokuk, Iowa and Hamilton, Ill.

Iowa, Sidney—County board passed resolution to construct 3 concrete and one tile culverts, to cost \$380, \$550, \$650 and \$600. Objections Dec. 1; F. B. Jenkins, county auditor.

Iowa, Waukon—County commissioners resolved to build stone and concrete bridge and culverts. Objections heard Dec. 17. Joe. Keiser, county auditor.

Iowa, Waverly—A movement has started for erection of bridge across Cedar River at the foot of Harmon st.

Man., Winnipeg—The plans for the proposed bridge at Arlington st. over the Assinaboine river will be completed shortly.

***Minn., Bemidji**—Work on bridge over Mississippi suspended for winter. Council granted a time limit to J. M. Price & Sons till May 10, 1914.

Minn., Duluth—No agreement has been made between the city and the Northern Pacific railroad relative to building of an overhead crossing at Smithville. Some months ago council passed a resolution directing the railroad to do the work, opinion of the city being that the N. P. should bare the expense, but so far nothing has been done. To avoid delay city contemplates building crossing and making the railroad stand the cost.

Minn., Duluth—The Duluth Missabe & Northern railroad will begin the construction of a viaduct on Highland st. as soon as city employes establish the grade.

Minn., Mankato—Bids received by C. L. Kennedy, 2 p. m., Dec. 16, for an 18-inch culvert plus 15, 12-inch corrugated metal culvert an 18-inch and a 12-inch concrete culvert; check for 10 per cent.

***Minn., Granite Falls**—Contract awarded to Jac. Sampson, Sioux Falls, S. D., for five bridges, this county; S. O. Tjosvold, auditor.

Minn., Minneapolis—State Engineer Cooley has gone to Washington to see if the government will help construction of international bridge across Pigeon river 20 miles from the Lake Superior shore.

Minn., Northfield—Recommendation for construction of a new middle bridge was submitted council by Mayor Hunt; estimated cost \$15,000.

Minn., Pipestone—The burning of a long wooden bridge on the Pipestone branch of the Omaha road 30 miles east of here may result in an investigation. The G. N. lost a bridge near and the R. I.'s big bridge 7 miles south was burned recently.

Minn., Sleepy Eye—Windharn bridge has been condemned and a new bridge probably steel or concrete will be erected next spring; Herman Polkow, chairman.

Minn., St. Paul—The proposition for a concrete parkway bridge to arch ravine between Dayton's Bluff and the city proper is considered. W. W. Dunn, chairman committee.

Minn., Thief River Falls—Minnesota Northwestern Electric Railway Co. is taking bids for a wood and steel bridge over Thief river. Company to furnish material.

Minn., Wadena—State Highway Commission will spend about \$20,000 on roads in the county of Wadena this year. Engineer D. C. Washburn has condemned several bridges

***Mont., Cutbank**—Reported that extension bridge will be replaced by heavier one and that the Great Northern plans a wagon bridge beside rail tracks.

Neb., Omaha—The M. P. R. Co., Earl Sullivan, engineer, will construct Nicholas st. viaduct by day work.

***N. D., Grafton**—Bids received by O. M. Fraser, county auditor, 2 p. m., Jan. 7, for furnishing all material and constructing and repairing wood or steel bridges. Number of bridges to be decided on at meeting of board Jan. 5. Check for \$500. Bids will be received at the same time for metal culverts. Check for \$200. Contractor must bid on each bridge separately.

N. D., Minot—The viaduct that the city is now using over the G. N. and Soo tracks has been condemned. The G. N. is willing to build an underground viaduct on Harzel st., providing the city will agree not to open any of the streets now closed, and also promises to build not later than 1916 a steel and concrete viaduct; E. J. Thomas, city engineer.

Sask., Regina—Council contemplating erection of a timber bridge over Wascana Creek at Elphinstone st., write commissioner L. A. Thornton.

Wash., Tacoma—Bids for four reinforced concrete bridges to be built on the campus of the university of Washington are called for by the engineering department of Northern Pacific. Bids to be opened Dec. 15, in St. Paul, Minn., at office of the chief engineer; the engineering department here will have charge of the work.

Wis., Appleton—This city will appeal to the railroad rate commission for a decision relative to the proposed construction of a viaduct over the Fox; Appleton wants the traction company to bear 50 per cent of the expense, claiming that the viaduct would eliminate the railroad crossings in the flats.

Wis., Dodgeville—New steel bridges have been built on the

Dodgeville-Freeport branch of the Illinois Central railroad and the work will continue for some time yet. The company contemplates the construction of all steel bridges on this branch of their road.

Wis., Manitowoc—Bridge committee stands 2 to 1 against repair of 8th st. bridge, favor new structure. L. K. Pitz, city engineer.

Wis., Manitowoc—Bids were opened for repairing the 8th st. bridge and the lowest bid was for \$22,990 while others ranged as high as \$28,977. A complete new bridge would cost but \$47,500 and it is probable that council will decide on a new structure.

Wis., Mishicot—Town of Two Creeks will build concrete bridge next spring; cost \$700; Aug. Last, chairman, RFD No. 3.

Wis., Rio—Springdale town will construct a concrete bridge next spring; cost \$600; T. E. Williams.

Wis., Lodi—Lodi town contemplates steel bridge next spring; cost \$1,200; A. R. Reynolds.

CONTRACTS AWARDED.

Mont., Hamilton—O. E. Peppard, Missoula has contract for bridge across Blodgett Creek at \$925.

S. D., McIntosh—The Western Bridge & Construction Co. was awarded contract for building bridges in the county for the next year.

S. D., Castlewood—Iowa Bridge Co. received contract for construction of all bridges in the county for the next year. The Sioux Falls Metal Culvert Co. for culverts.

S. D., Salem—The W. A. Barnhart Construction Co., Salem, received contract for all concrete bridge work for the next year. Standard Bridge Co., Omaha, for all steel bridges for the next year.

Wis., Eau Claire—Union Construction Co. has begun work on the bridge over Little Niagara creek to carry the Putnam Park drive. It will be of reinforced concrete with railings.

DRAINAGE AND IRRIGATION

Notes Arranged Alphabetically by States.

Iowa, Adel—Hearing Dec. 18, on proposed drainage ditch 28, M. T. Finley, county auditor; main ditch and four branches.

Iowa, Britt—Bids received until 1 p. m., Jan. 2, for material and labor, county drain 28; about 35,000 feet tile, 8 to 28-inches, first quality salt glazed vitrified clay to comply with Iowa State Drainage association specification; W. L. Fitkin, auditor, Hancock Co.; bids received until same hour and date for county drain 33.

Iowa, Cedar Rapids—The election for voting \$125,000 bonds to build concrete and steel dam will be held Dec. 15; L. J. Story, city clerk.

Iowa, Fonda—All bids for town drain too high will be re-advertised.

Iowa, Muscatine—Bids opened for drainage ditch No. 13, and boards of two counties will meet Dec. 15, at Wapello, to allow contract; bids received from G. H. & R. H. Williamson, Chicago; Timothy Toohey, Ft. Wayne, and Chapman Bros., Celino, Ohio.

Iowa, Onawa—Resolution for Hamm tile drain passed and bids will be secured.

Iowa, Sac City—Contract awarded to R. E. & H. Clifton for labor on district 43 at \$1,344; tile to Cement Products Co., Sac City, \$2,240; A. Cunningham, engineer.

Minn., Breckenridge—Committee on ditch six reported out-let too small and cleaning necessary for some districts; recommended engineer be engaged to survey and that bridge between sections 16 and 17 be replaced by span bridge.

Minn., Fairmont—All bids rejected on judicial ditch 36; Schafer Bros., Fairmont, \$6,950; Otto Jensen, Clear Lake, \$7,200; Walter Anderson, Clear Lake, Iowa, \$7,500; John Eltgroth, Fairmont, \$7,200; work will be re-advertised; Lee Brown Monterey, appointed engineer, ditch 37; G. M. Miller, engineer, ditch 38.

S. D., Deadwood—About \$300,000 it is expected will be raised for the Little Missouri irrigation project, Custer county, Mont., to be installed under Cary law; work probably will start early in spring; F. F. Lyon, attorney, Butte; E. H. Albion, civil engineer, Custer, Mont., interested.

CONTRACTS AWARDED.

Iowa, Eldora—Contracts awarded on drainage district 1, for labor to Blackmore & Harris, Nevada, Iowa, \$12,489; tile, 24-inch and down, Eldora Pipe & Tile Co., Eldora, \$13,961; tile, 33-inch, Evans & Howard, St. Louis, Mo., \$2,909; E. L. Marriage, county auditor.

Iowa, Pocahontas—Contract awarded for district 75, to Mason City Brick & Tile Co., \$4,109; Larson & Dahline, Manson, Iowa, \$3,947; L. M. Rude, engineer.

Wis., Elkhorn—J. L. Stokes, Elkhorn Dredge Co., has contract for twelve miles of work on drainage district north of Appleton, cost \$18,000; work to begin as soon as machine can be installed.

BEFORE THE WINTER WINDS COME--BE PREPARED

WHEN you are making final repairs for the winter, do not fail to mention LINO FELT to your customer. Put it in the walls and roof of his home, and the comfort and saving in fuel which the use of this greatest of all Cold, Heat and Sound insulations will give him, means an increase of business for you. New or Old Buildings---There is a Way.

We Have It
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UNION FIBRE COMPANY, --:-- Winona, Minn.

PROPOSAL ADVERTISING FOR BIDS.

NOTICE TO CONTRACTORS.

Sealed proposals will be received by the Board of Education of Montevideo, Minn., on or before 4 o'clock P. M., Monday, Dec. 29, 1913, for the erection and completion of a new school building, according to the plans and specifications of William B. Ittner, architect, which may be viewed at the office of the Board of Education, Montevideo, at the office of the Builders' Exchange, Minneapolis, St. Paul and Duluth.

The Board reserves the right to reject all bids.

C. A. FOSNES,
Clerk.

ADDITION TO LAUNDRY BUILDING.

Sealed proposals will be received by the State Board of Control, State Capitol Building, St. Paul, Minn., until 2 P. M., Monday, December 15th, 1913, for the erection and completion of additions to Laundry Building, at the Minnesota Soldiers' Home, Minneapolis, Minn., including the general contract work, heating and ventilating, plumbing and electrical work, in accordance with plans and specifications furnished by C. H. Johnston, Architect, 715 Capital Bank Building, St. Paul, Minn. Bids will be received collectively and separately. Bids to be submitted only on form of bid supplied by the Architect;

no other form will be considered. Bids to be accompanied by a certified check for 5 per cent of the amount of the bid, payable to the State Board of Control, which check will be returned when building contract is executed.

Copies of above plans and specifications may be seen at the Builders' Exchange in St. Paul and Minneapolis, at the office of the Soldiers' Home and at the office of the State Board of Control, State Capitol Building, St. Paul, Minn.

Extra copies of the plans and specifications may be obtained on Application to the architect on payment of cost of duplication. Successful bidders must furnish the Board with a surety company bond in 75 per cent of the amount of contract. The right is reserved to accept or reject any or all bids.

AUCTION SALE OF DREDGES.

In the Matter of the Standard Drainage Co., Bankrupt.

The undersigned will sell at public sale to the highest bidder for cash at No. 202 Odd Fellows' building, Mankato, Minnesota, on December 27th, at two o'clock, P. M., the following personal property belonging to said estate, to-wit:—

One Bellefontaine floating dredge,

has a yard dipper, 35-foot boom, hull 18 by 65 feet, 45 horse power boiler, appraised value \$1,500, and now located at the west end of Lateral 6, State Drainage Ditch No. 90, one-half mile east of the Village of Karlstad, Minnesota; also one Bellefontaine floating dredge, has a yard and a quarter dipper, 40-foot boom, hull 18 by 65, 50 horse-power boiler, appraised value \$1,500, now located at State Ditch No. 84 near Lancaster, Minnesota; also one Bellefontaine floating dredge, has a yard and a half dipper, 45-foot boom, hull 22 by 70, 70 horse power-boiler, in first class condition, appraised at \$4,000, and located one and three-fourths miles west of the Village of Karlstad, Minnesota; and also one centrifugal six-inch suction pump and one centrifugal eight-inch suction pump; one timber 8 by 10, 36 feet long, and one timber 12 by 12, 26 feet long.

For further information write OLAF E. SELNES, Trustee, Windom, Minnesota.

WANT ADS SPECIAL NOTICES

NOTICES under this heading will be inserted at the rate of fifteen cents per line, each insertion; no notice inserted for less than 50 cents.

WATER WORKS

Notes Arranged Alphabetically by States.

Alta., Calgary—Tenders will be called for soon for a filtration plant and pumping station. One plan is to build a dam and a storage reservoir, the other a filtration plant and pumping station with a capacity of 40,000,000 gallons. A. G. Graves, commissioner, A. W. Ellison Fawkes, engineer.

Iowa, Anita—Engineer will soon be selected to plan water works system; cost \$15,000; H. H. Cate, city clerk.

Iowa, Des Moines—Several committees representing a number of improvement leagues of the city are considering the water works proposition.

Iowa, Fairfield—Bids received by W. L. Long, city clerk, till 7 p. m., Dec. 16, for furnishing foundations by city, a steel tank 150,000 gallons capacity, on steel tower, 100 feet to balcony. Check for \$500. Bidders design may be used, but detail plans and general drawings for same must accompany each bid. Hall & Adams, engineers.

Iowa, Glenwood—Bonds will soon be voted for construction of a water works system.

Iowa, Greenfield—Richard Sheldon has begun work on new city well.

Iowa, New London—Election Dec. 13, to vote additional bonds of \$2,000 for water works. Plans call for 3 miles of mains, 28 fire plugs.

Iowa, Perry—The water works plant will be rebuilt at a cost of \$35,000.

Mich., Dundee—Proposition for water works held until spring; estimated cost \$20,500. Otto Spohr, village clerk. Geo. Champe, consulting engineer, 610 Nasby building, Toledo, O.

Mich., Lake Linden—Council considering water works system.

Minn., Dexter—Bids received 8 p. m., Dec. 15, for material H. S. Newton has asked that a 6-inch water main be laid to their plant and two hydrants installed. A. E. Bickford, city clerk.

Mnn., Dexter—Bids received 8 p. m., Dec. 15, for material and installation of a waterworks system; check for 5 per cent.

Minn., Duluth—Council appropriated \$5,000 for gas and water main extensions.

Minn., Duluth—Bids received by C. S. Palmer, city clerk, till Dec. 4, 3 p. m., for laying gas and water mains on various streets; check for 10 per cent.

Minn., Elbow Lake—J. F. McCarthy, Minneapolis, was awarded contract for sinking a new well for city.

Minn., Eveleth—It is proposed to extend a 6-inch water main 400 feet south of Fayal road from line now under construction; D. P. McIntyre, city clerk.

Minn., Little Falls—Council has been petitioned for a water main to the Lincoln school building; Victor Schalleron, city clerk.

Minn., Minneapolis—Bids received by G. H. Hayes, 2 p. m., Dec. 10, comptroller, university of Minnesota, for drilling and casing a 3-inch well, furnishing cylinder pipe for pump, and pump rods at the demonstration and experimental station at Waseca, Minn.

Minn., Stewartville—Work has been begun on the extension of the water mains.

Minn., Wabasha—Water works bids will be advertised for in a few weeks.

Mont., Park City—An auxiliary pumping plant consisting of two 20-inch centrifugal pumps driven by 200-horsepower motors, to be operated in connection with its present irrigation system is being considered by the Cove Ditch Co.

Neb., Bruning—Bids received Jan. 15, by C. G. Bruckert, village clerk, for water works system and electric light plant. Grant & Fulton, engineers, Lincoln, Neb.

Neb., Humboldt—O. A. Cooper & Son have made a proposition to the city in regard to improvement in their water works system, connecting up part of the system with their own private one at their milling plant.

Neb., Leigh—Bids received 8 p. m., Dec. 29, E. M. Nelson, village clerk, air lift pumping outfit complete, tank and necessary piping, a 30 h. p. Otto gasoline engine; check for \$200.

Neb., Minatare—J. S. Schwartz, Colorado Springs, awarded contract for water works.

Nelson, Neb.—Proposition to pipe water from Weel Springs, cost wooden pipe \$1,700, steel pipe, \$26,000; F. A. D. Parker, engineer, I. J. Wehrman, mayor.

Neb., Polk—Henning Larson has contract for an addition to water works building, 24x30.

Neb., Superior—Election held Dec. 16, for \$21,000 for a new water supply.

Neb., Walthill—Bids will soon be received by R. B. Carlberg, city clerk for 2,000 feet, 4 and 6-inch iron water pipe to cost \$3,000; E. W. Anderson, city engineer.

Ont., Port Arthur—Resolution will be voted on in January for \$202,167 for water works extensions.

S. D., Britton—Council decided to extend water system to include entire city.

S. D., Sioux Falls—J. O. Fowler has contract for water mains on Prairie av.

S. D., Witten—Bids are being asked for sinking 12 artesian wells.

Wash., Tacoma—An ordinance providing for construction of 12-inch, 8-inch and 6-inch wooden water pipe, together with necessary gates, tees crosses, hydrants, specials and connections with present mains, creating local improvement district No. 5008, has been introduced into the council; H. E. Edwards, city clerk.

Wis., De Sota—Election Dec. 16, to vote bonds for water works system.

Wis., Superior—Bids received by W. J. Leader, clerk of Douglass county, for 25,000-gallon steel tank and tower at workhouse farm, South Range. J. O. Bach, architect, Newton building, Superior; certified check.

CONTRACTS AWARDED.

Iowa, Mount Ayr—Des Moines Bridge & Iron Co. was awarded water works contract, \$36,169. Other bids: Blackhawk Construction Co., Waterloo, \$39,954; Bash & Gray, Joplin, Mo., \$36,988; Inter-Mountain Construction Co., Tecumseh, Neb., \$40,122; Moffatt Co., Des Moines, \$39,757; Arthur C. Dobson, Lincoln, Neb., \$37,734; W. O. Lowell, Minneapolis, \$37,300; Public Service Construction Co., Omaha, \$37,501; work on cement dam and wells to begin at once.

Minn., St. Paul—John D. Roberts awarded contract for a boiler at the Centerville pumping station.

Neb., Ralston—E. D. Pacey was awarded contract for water works.

Iowa, Sioux City—At the spring election in this county a proposition will be submitted for bonding the county for a new court house to cost \$1,000,000; a rough sketch of the proposed building has already been approved by the board; it will be 6-story, have four acres of floor space, and the outward appearance of a modern and dignified public building; to be of granite, cut stone and terra cotta, 150x150, set flush to the street on two sides; mural painting contemplated; plan by P. B. Newman, a draughtsman in the employ of W. L. Steel, a local architect; E. E. Hosmer, county auditor.

Minn., Anoka—Plans for the proposed armory have been revised and as soon as approved by the state board will be ready for bidders; address the city clerk.

Minn., Graceville—The council has amended its former action so that now it guarantees to provide \$700 per year for the support of city library, and on the strength of this \$7,000 will be asked for from the Carnegie fund.

Minn., Hibbing—Contract for the fire hall at Alice has been let to Tomlinson & Egan, city, at \$20,450, which includes specifications for the improvement to the ceiling as petitioned for; other bidders were: Bowe-Burke Co., Duluth, at \$19,825, but the improvement noted was not included; Johnson & Watne, \$22,685; A. P. Nelson, \$21,393.

Minn., Minneapolis—Bids received by state board of control, capitol building, St. Paul, Minn., until 2 p. m., Dec. 15, for laundry building at the Soldiers' home, complete. Officially advertised in this issue of the Improvement Bulletin.

Minn., Ortonville—Site has been selected for the Carnegie library building; C. J. Clark, city clerk.

Mo., Ozark—A committee composed of James J. Williams and others is investigating to get ideas for the new Christian county court house; to be of Carthage marble, fireproof, and thoroughly modern; Walter E. Keltner, county clerk.

Mont., Havre—The old city jail building having been condemned, a modern and up-to-date jail building will probably be built as soon as possible; address the city clerk.

Mont., Helena—Bids received by J. A. Mattson, city clerk, until 8 p. m., Dec. 15, for repairs to stage of auditorium building; check for 10 per cent.

Mont., Twin Bridges—Charles D. Lundwald, Bozeman, Mont., who is to build the state orphans' home at this place, has begun the construction work with a large force of men.

Neb., Crete—The site for a park and for the proposed library have been purchased; address the city clerk.

Neb., Greeley—Work is progressing rapidly on the court house here; concrete roof has just been completed.

Neb., Kimball—The county commissioners will consider plans for the proposed court house for Kimball county, construction of which is expected to begin in the spring; F. M. Whitman, clerk.

Okla., Stillwell—The citizens of the county propose to build a court house free of cost to the county to replace the building badly damaged by fire some time ago. One man will donate 500 perch of cut stone, and subscriptions will be taken to the amount of \$25,000.

Ont., Port Arthur—Proposition for expenditure of \$75,000 for new court house and jail will be voted on in January; also, for \$35,000 for addition to police station; address the mayor.

Ont., Rainy River—An election will be held in January to vote on the proposition to expend \$8,000 for the construction of an exhibition building, to be used as a municipal skating and curling rink, with a public hall over the waiting room; E. E. Jess, town clerk.

Sask., Regina—Plans for beautifying parliament buildings being prepared by Thomas Mawson, landscape architect.

Sask., Saskatoon—The federal government has practically decided to start work on a new postoffice building to cost about \$400,000; also an armory is to be built to cost \$300,000, a custom warehouse to cost \$40,000, mounted police barracks to cost \$35,000, and interior terminal grain elevator, \$1,000,000.

Sask., Watrous—Major Lindsay, Winnipeg, has been here looking up a site for the proposed drill hall and armory.

Texas, Dallas—Permit issued for county jail to cost \$550,000; to be 8-story, construction under way; H. A. Overbeck, architect.

Texas, El Paso—Local people voted in favor of a joint county and city building to cost about \$500,000; also voted in favor of an auditorium and market house.

Wis., Ashland—The proposition on the part of the city of Ashland to join with the county in the erection of a joint court house and city hall has been rejected by the county board, which will go ahead with the court house plans.

Wis., Chilton—Bids received by A. W. Wieting, chairman of committee, until 2 p. m., Jan. 6, for the rodding of the new court house with the best copper cable on the market.

Wis., Delavan—The township of Linn is agitating for a new town hall, and a committee, of which Thomas Cox is chairman, has been appointed to investigate the matter.

PUBLIC BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Calgary—Proposition to establish a city dispensary under consideration.

B. C., Coquitlam—Plans for proposed city hall have been prepared by Parr, McKenzie & Day, Vancouver; cost to be \$47,000.

B. C., Vancouver—Bids are to be received shortly for the buildings for the University of Columbia at Port Grey, to cost \$500,000. Sharp & Thompson, architect, London building, Vancouver.

Colo., Denver—Erection of wing to county jail to cost \$100,000; under consideration; address county auditor.

H. T., Pearl Harbor—W. N. Concannon Co., San Francisco, at \$346,960 was low bidder for structural steel work for coal-fing plant and naval station, Pearl Harbor, H. T. Other bids were: United States Steel Products Co., 30 Church st., New York City, \$377,200; King Bridge Co., Philadelphia, Pa., \$559,000; Hamilton & Chambers, 29 Broadway, New York City, \$367,800; Riter Conley Manufacturing Co., Pittsburgh, Pa., \$357,260.

Ida., Idaho Falls—J. W. Dill, architect, will begin preparing plans and specifications for the proposed Carnegie library building, to be erected in this city early this spring; 40x70, concrete and pressed brick, and to cost about \$15,000.

Ida., Weiser—Petitions will be circulated for an election to vote on bonds for a new court house and good roads; address the county auditor.

Ida., Weiser—Campaign started to secure \$120,000 court house and jail for Washington county.

Ill., Edwardsville—Sketches received by the board for proposed \$250,000 court house to be built here and an architect will be selected at once; address county auditor.

Iowa, Des Moines—A state-wide movement to raise funds for an Iowa building at the Panama exposition in San Francisco has been started; L. C. Anderson, an exposition commissioner, hopes to have a state meeting held shortly to inaugurate plans to raise \$50,000.

Iowa, Leon—Proposed to erect substantial brick building for water works system; address city clerk.

Iowa, Montezuma—The county jail has been virtually condemned on the examination of an architect and also a builder, and a new building will doubtless be ordered soon; W. C. McKee, county auditor.

Wis., Delevan—All bids for the federal building have been rejected as being too high.

Wis., Fond du Lac—Estimated repairs to the jail will be \$1,200, this including the tearing out of the old walls, installation of the new steel cell cage, and all plumbing; address the city clerk.

Wis., Hartford—The city jail has been condemned and a new building ordered; Walter H. Ives, city clerk.

Wis., Madison—Plans for new arts building at state university have been agreed upon by authorities.

Wis., Marinette—The county board has voted to build a tubercular sanitarium to cost about \$20,000; definite action to be taken at the session in January; H. B. Pederson, county clerk.

Wis., Neenah—Citizens want to expedite architect's work at Washington, so that the public building ordered may be built sooner than is proposed; said to be 734 authorized buildings in the architect's office all subject to same delay.

Wis., Portage—Committee having matter in charge will be prepared to submit plans for the poorhouse at the meeting of the Columbia county board next month; the committee comprises supervisors, Lashier, Fall River; Towers, Caledonia; York and Brodie, Portage; and Holtz, Columbus.

Wis., Portage—It is expected that the county board will decide definitely on the proposed poor house for Columbia county about the middle of January; A. D. Conover, architect, Tenney block, Madison, Wis.; E. E. Price, county clerk, Portage, Wis.

Wis., Waukesha—C. C. Anderson, architect, city, expected to have completed this week the plans for the proposed municipal hospital here, to cost about \$10,000; address the city clerk.

Wis., Waupaca—A committee has been appointed, of which A. R. Potts is chairman, to thoroughly investigate the advisability of changing the site, secure options on more desirable sites, and to sketch plans and secure estimates for the building of a new jail, and report at the next meeting of the county board; cost contemplated is about \$17,000.

Wis., Wyocena—The county board will make improvements to the county buildings as follows: New wing for men, \$28,500; connecting corridors, \$5,000; refectory \$29,000; cold storage, \$4,000; additions to women's wing, \$13,000. A. D. Conover is architect.

CONTRACTS AWARDED.

Iowa, Fontanelle—Contract made with C. H. Cass, bridge-water, for modern city hall; hard faced brick, hollow tile, cement floors, metal ceiling.

Minn., Albert Lea—Contract for the house at the poor farm has been let to C. M. Tapager at \$14,985; other bidders were: A. J. Leonhardi at \$17,990, and N. C. Sorenson at \$16,110; plans for the heating plant, plumbing, wiring and light will be prepared at once.

Minn., Hibbing—The Standard Salt & Cement Co., Duluth, have been awarded contract to furnish brick to be used in the proposed Alice fire hall building, to be furnished at the rate of \$24.50 per thousand, and to be variegated colors, conforming to the samples selected.

N. D., Center—Contract for steel filing devices in the court house has been let to Walker Bros. & Hardy, Fargo, N. D., for made-to-order stuff, at \$279. Other bids, all on stock stuff, were as follows: Dakota Printing Co., Bismarck, N. D., \$297; Globe-Gazette, Wahpeton, N. D., \$277; Walker Bros. & Harry, Fargo, \$246. Frank J. V. Kirbert, county auditor.

S. D., Lead—Contract has been let to Mullen & Rourke for converting the Alert hose house into a fire station, at \$2,379. Other bids were as follows: Rasmussen Bros., \$2,284.30; Larkee & Johnson, \$2,850; O. A. Ellis, \$3,386.07; Burnett & Ramsey, \$2,759.

ELECTRICAL

Notes Arranged Alphabetically by States.

Iowa, Corwith—Agitation started for electric lights.

Iowa, Pocahontas—Northern Telephone Co. will soon begin new building.

Iowa, Rockwell City—Electric light plant burned.

Iowa, Shelby—20-year franchise was granted Avoca Electric Light & Power Co.; lights on Feb. 1.

Mich., Iron Mountain—Oliver Mining Co. is installing hydro-electric plant, reinforcing with steam plant, steel towers, transmission lines erected.

Mich., Wakefield—Bonds for \$5,000 were voted for buying a distributing plant for electric lights. The village will own the equipment but purchase the power from the Gogebic & Iron Railway & Lighting Co.

Minn., Big Stone—Stock company formed here to put in electric lights; power will be furnished temporarily by canning factory.

Minn., Duluth—Twenty arc lights west of the Point of

Rocks will be replaced by incandescent lamps. Chas. S. Palmer, city clerk.

Minn., Hastings—Grading on trolley line, Hastings and Inver Grove, completed; lay rails soon.

Minn., Hibbing—Commercial club, president Rupert Swinerton, is collecting data for proposed extension of street car line to Grand Rapids; Oscar Mitchell, president, Mesaba Railway Co., asked for sketch showing suggestions as to location of line.

Minn., Kenyon—Dr. J. A. Gates, owner of local telephone system is planning reconstruction entire system in spring; open circuit lines will be replaced by copper metallic circuit.

Minn., Kingston—Citizens raised \$15,000 bonus asked by Electric Short line.

Minn., Mankato—Surveys have been begun for extension of electric line to St. Clair by W. F. Brooke.

Minn., Ortonville—Bids received by C. J. Stark, city clerk, 8 p. m., Dec. 15, for delivery, installing and connecting switch-board, 100 k. w., alternating generator, one exciter and high speed engine.

Minn., Perham—Council appointed Amos Marckel, Dr. Berthold and others, a committee to investigate repairing and enlarging present power plant or buying electricity; plant is overloaded.

Minn., Minneapolis—Within two weeks the work of grading the right-of-way on the cut-off which will bring the Dan Patch line into the heart of the city will be completed.

Minn., Montevideo—Citizens Telephone Co. has applied for a new franchise.

Minn., Northfield—Council plans to extend street lighting system.

Minn., Pine River—Farmers' Mutual Telephone Co. organized will build to Horeshoe lake; N. D. Sherwood, president, E. A. Balcom, secretary.

Minn., St. Cloud—Public Service Co. will remove poles from business streets.

Minn., St. Cloud—Minneapolis Union Electric Co. is projecting a trolley line from Minneapolis to this place via Hamel, Hanover, St. Michael, Buffalo, Maple Lake and Annandale; right-of-way reported secured.

Minn., Tracy—Woodruff & Thompson have contract to erect addition to the power house.

Minn., Virginia—St. Louis power will soon begin construction of transmission line to Biwabik; same company negotiating with the Aurora city council for lines to that place. A consulting engineer has been engaged.

Minn., Virginia—City Engineer Johnson prepared plans for new transmission line from city power station to mill to take care of peak load.

Mont., Butte—Mr. Wharton, manager of street car company, states lines will be extended to mines in North Butte. Work to begin in April, completed in June. Cost \$15,000.

Mont., Sheridan—The telephone line is being rebuilt between here and Ruby.

Neb., Lincoln—Stock and bond issue in the \$13,000,000 interurban road and power project planned for the Niobrara river by the Baker Construction Co. of Omaha, will be issued.

Neb., Wymore—Another dynamo and engine will be purchased for electric light plant.

N. D., Norwich—Farmers on lines 3 and 15, Norwich Telephone decided to purchase these lines.

Ont., Port Arthur—A vote will be taken in January on a resolution for \$8,000 for extensions to street lighting system and \$55,000 for extensions to the electric power system, \$35,000 for telephone improvements and \$35,000 for street railways.

Sask., Prince Albert—The council is arranging to erect a steam power house and plant to cost \$275,000. O. Davidson, clerk. Nothing will be done until next year.

Sask., Yorkton—Bids will be received by the town council Dec. 22 for supplying and delivery of one 500-B-horsepower combined unit. Plans and specifications at the office of T. F. Acheson, secretary-treasurer; M. M. Inglis, engineer.

S. D., Big Stone—A company has been formed here for the installation of an electric light plant. I. D. Aldrich was elected president. Work to begin at once.

S. D., Gregory—The electric light plant was burned, loss on machinery, \$12,000.

S. D., Sherman—All rural and town lines have been purchased by A. K. Hansen.

Wash., Wenatchee—Chalen county commissioners granted a 50-year franchise to Hyman Harris, a local merchant, to construct 35 miles of interurban. Leavenworth to Malaga, on condition that line be completed in 5 years.

Wis., Eau Claire—Transmission lines may be built from here to Fall Creek, Augusta and Fairchild if enough power will be used by these villages to warrant the plan. Geo. B. Wheeler, local manager. If these lines are not built a dam will be built on the Henry Kopplin farm near Fall Creek across Fall Creek and at Augusta a dam will be built on the Eau Claire river for light for the village.

Wis., Fond du Lac—Work has been begun on building the Eastern Wisconsin Railway & Light Co.

Wis., Madison—The Bell Telephone Co. will erect a new exchange at 10th av. and Laphan st.; cost \$25,000, to be completed Jan., 1915. Immediate improvements will be the laying of new underground cable to carry about 4,000 miles of wire and there will be additional aerial construction.

Wis., Manitowoc—It is reported that the Manitowoc and Northern Traction Co., is interested in the project of an electric interurban line from Two Harbors to Kewaunee and Sturgeon Bay and to Mishicot.

Wis., Sheboygan—Peter Reiss, Reiss Coal Co., bought street railway and electric power company here. Possession at once; includes interurban lines.

Wis., Sturgeon Bay—Sevastapool Farmers' Telephone Co. incorporated by John G. Walker and others; capital \$3,000.

CONTRACTS AWARDED.

Neb., Aurora—Electric Co. let contract to Midwest Construction Co. for new office building and remodeling work rooms, plate glass doors and windows, stone trimmings; hydraulic brick construction, 2-story, vaults, skylights; cost \$8,000. J. W. Salmon, Lincoln, architect.

Sask., Swift Current—The Gillstrom Construction Co., local firm, have contract to erect powerhouse. C. D. Arnott, secretary-treasurer; D. Mackie, engineer.

Wis., Niles—Jos. Skobis, Milwaukee, has been awarded the general contract for a power plant here.

(Additional Electrical news page 45.)

HOTELS AND HOSPITALS

Notes Arranged Alphabetically by States.

Iowa, Davenport—Plans have been prepared for the proposed \$500,000 Back Hawk hotel, bids will soon be called for; address Black Hawk Hotel Co.; P. T. Walsh, chairman trustees.

Iowa, Des Moines—State of Iowa is building a tuberculosis hospital for insane at Cherokee; tuberculosis annex at Mt. Pleasant; cottage for nurses at Independence; address H. F. Liebbe, state architect, Des Moines.

Iowa, Marion—Board of supervisors of Linn county planning a modern sanitarium; F. A. Canfield, county auditor.

Iowa, Newton—At next election \$40,000 will be voted for a hospital here.

Iowa, Sioux City—Plans reported to be under way for a state hospital, brick, stone and cement; H. F. Liebbe, state architect, Des Moines, Iowa.

Man., Winnipeg—Leland hotel was burned, loss about \$300,000.

Minn., Bovey—Town boards of Bovey, Coleraine, Taconite and Iron range may combine in construction of detention hospital to cost about \$2,000; address County Commissioner Shellman, Nashwauk, Minn.

***Minn., Chisholm**—General contract let Johnson & Watne, Hibbing, Minn., for detention hospital, at \$8,122; heating, plumbing, vacuum cleaner, R. E. O'Brien, Chisholm, \$2,853; other bids, general: A. L. Bergeren, Chisholm, \$9,446; Frank Impleau, Chisholm, \$11,804; heating, etc., A. C. Schirmer, Chisholm, \$3,771; Adam Sscirmer, Chisholm, \$4,400; C. K. Shand, architect.

Mont., Butte—Fire destroyed Pipestone Springs hotel; loss about \$30,000. W. H. Davey and Dr. M. J. Scott, chief surgeon at St. James, hotel owners.

Minn., Rochester—Hotel Roberts Co. has been organized by Arthur L. Roberts, Cornelius M. Judd and Geo. W. Granger to build a hotel on Main st.; brick, fireproof, 3 or 4-story, 125 rooms.

Minn., Walker—Time extended to Jan. 2 at 2 p. m., for bids on service building; state board of control, St. Paul.

Mont., Culbertson—J. G. Nugent, plans to erect a new \$20,000 hotel in the spring.

Neb., Nebraska City—Straub heirs will build a 4-story hotel next spring.

Neb., Norfolk—A hotel to cost \$100,000 is proposed by E. L. May, president Virginia Tobie Cigar Co., which would finance the proposition; stock company to be organized; 100 rooms, 40 with bath.

Neb., Omaha—New \$110,000 Evans hotel was completed and is now open.

Sask., Moose Jaw—Jack Lashy and Bruce Zees are arranging to build a hotel.

S. D., Mitchell—J. H. Davidson of the Wildman hotel, planning extensive improvements in near future to cost about \$5,000; hot and cold water for every room, new steam heating system, etc.

Wash., Kennewick—Fire destroyed White Bluff hotel; loss estimated at from \$9,000 to \$10,000; White Bluffs Land & Irrigation Co., owners.

Wis., Portage—A. T. Woodster will build a \$100,000 hotel at Iron River, Mich.

Wis., Rosendale—Sherwood Forest hotel was burned; new hotel will be erected, steel and stucco construction, 50x200, modern throughout; attorney, Frank C. Howard, proprietor.

Wyo., Sheridan—Contract with A. Carlson, city, for the nurses' home.

CONTRACTS AWARDED.

Iowa, Cedar Falls—Contract awarded to C. S. Smith, Waterloo, for the proposed \$35,000 hospital; foundation in and further work suspended until spring.

Minn., Mankato—Oscar F. Symons & Co., 838 Plymouth building, Minneapolis, furnished the Monarch metal weather strips for windows for addition to St. Joseph's hospital; Otto Neitge, general contractor.

Minn., Ironton—Contract awarded to Wm. Blackwood for installing plumbing and heating in the Peter Spina hotel.

Wash., Sedro Wooley—Contract for new dining room and kitchen for Northern hospital for insane awarded to Sheppard & Warrack, Seattle, at \$22,770; plumbing contract to Ben Olson, Tacoma, at \$2,785.

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

Iowa, Marshalltown—Plans will soon be out and bids asked for the Y. M. C. A. building proposed here; cost from \$80,000 to \$90,000; address secretary of the association.

Iowa, Mt. Auburn—Odd Fellows contemplate 2-story building next year; second story for lodge.

Iowa, Olin—Special election Dec. 12 to issue bonds for \$1,500 for town hall; Geo. B. Macomber, town recorder.

Iowa, Sioux City—Three grandstands with seating capacity of 7,500, also bleachers, to be built by Auto & Speedway association, S. C. Douglas, president, 4604 Morningside av.; to be built before July 1914.

Iowa, Spirit Lake—Bert Francis will build a brick theater, 24x110.

Minn., Albert Lea—Committee H. E. Skinner, chairman, appointed to raise funds for Y. M. C. A. structure.

Minn., Aurora—E. T. Sandberg has leased the E. W. Lund store building and will remodel it into a modern theater.

Minn., Lake City—D. C. McKenzie begun moving picture theater, Lyon and Main, 32x100, concrete and hollow tile, seating capacity of 450 exclusive of gallery.

Minn., Ortonville—Henry Sarvis is building a moving picture theater, 25x100, 20-foot ceiling, marble front.

Mont., Bozeman—Site selected for Y. M. C. A. building and the Fred F. Willson Co. selected as architects and advised to submit sketches at once; W. S. Davidson made chairman of building committee.

Mont., Helena—The Helena Theater Co. organized, Charles Byce as secretary, and theater with capacity of 1,200 will be built; cost to be \$100,000, including site.

Neb., Fullerton—M. N. Bair, Hastings, Neb., architect for proposed lodge building by I. O. O. F., 60x62, 2-story, brick, cost \$9,000; Kasota stone, asbestos roofing, brick cornice, d. s. and plate glass, hard wall plaster, yellow pine flooring and interior finish.

Neb., Kearney—Site for proposed Y. M. C. A. building has been selected; John N. Dryden, chairman of committee.

Neb., Seward—A building committee of the Commercial club has been appointed to consider the subject of the club home.

N. D., Rhome—Odd Fellows are back of a hall project for the town, 32x80, stage, dressing rooms, etc., dancing room, lodge room in basement.

N. D., Williston—Plans about completed for Elks' building and contract will be let this winter; cost, \$15,000; M. J. Borden, chairman committee.

S. D., Sioux Falls—Plans for proposed Eagles' lodge agreed upon; Joseph Schwartz, architect, W. J. Mulvey, secretary.

S. D., Watertown—The Eagles considering new lodge home; John H. Scott, secretary.

CONTRACTS AWARDED.

Alta., Calgary—General contract has been let to McDougall & Foster, Ltd., board of trade building, for a theater and office building at 210 9th av. E., to cost \$175,000, for O. G. Devenish, 813 1st st. E.; the sub-contracts will be let by the general contractors. The building will be 5-story, 37½x150, steel, terra cotta and brick construction, with concrete foundations, electric lighting, steam heating, marble, plate glass, one passenger elevator, fire escapes, iron railings and stairs.

Iowa, Clinton—Contract for coliseum made with E. Krieger and work to begin at once.

Iowa, Northwood—Contract to Chas. G. Wood, Dubuque, Iowa, for remodeling Dwelle opera house; enlarged seating capacity, new scenery.

Mont., Great Falls—Contract for the theater building to be built by the Rocky Mountain Fire Insurance Co. has been let to the Miller Construction Co., city at \$78,690; building plans

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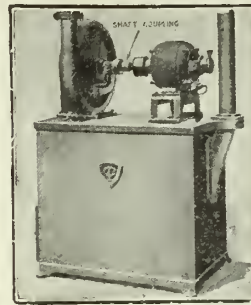
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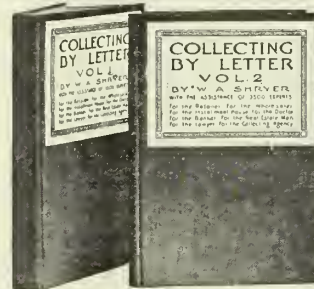
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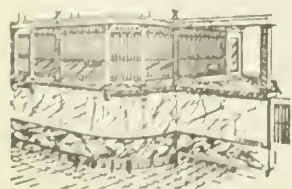
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have been changed and it will now be 3-story; total cost, including equipment, about \$160,000.

Neb., Lincoln—Contract let to Nebraska Material Co. for a 2-story structure, 50x140, second floor for ball room; maple floor over concrete; reinforced concrete and fireproof; cost \$30,000.

SCHOOLS

Notes Arranged Alphabetically by States.

Alta., Calgary—Excavation is completed for the \$60,000 college which is being erected by the R. C. Diocese, west of University Heights; architects, Laing & Smith, Beveridge block. The Swanson Co. has contract, 325 Judge Travis building.

Alta., Calgary—Proposition will be discussed for erection of a law school, Dec. 18.

Iowa, Adel—Bids received about Dec. 6, for a 3-story, brick concrete, fireproof high and grade school house, 160x87, Trunk & Gordon, architects, St. Joseph, Mo.; steel beams, ornamental iron stairs, tile reinforced concrete, gypsum block, fireproofing, vitrified brick, steam heat, electric lights, sheet metal cornice, sky lights, galvanized composition roof, patent plaster, metal lath, slate black boards; cost \$40,000; bids close Dec. 20.

Iowa, Burlington—Contracts for two new schools here will be awarded in February.

Iowa, Carroll—A 2-story brick school house will be erected 54x80; bids received Jan. 15, J. R. Smith, architect, Lincoln, Neb.; cost \$16,000; steel beams, iron stairs, joist hangers, and fire escapes, tile fireproofing, lime cut stone, common pressed hollow brick, steam heat, electric lights, sheet metal cornice, composition roof, corner beading, slate, maple floors, pine finish, rolling partitions; bids taken by secretary.

Iowa, Des Moines—F. N. Carss, city engineer, has been notified by C. L. Clinite, secretary, that plans for three new school houses are being made and will be submitted to city for approval.

Iowa, Livermore—Plans prepared by James S. Cox for a 2-story, basement school house, 60x84, brick, fireproof, steel frame, iron, terra cotta, cut stone, common pressed brick, steam blower heat, electric light, gas, sheet metal sky lights, composition roofing, common metal plaster, plate, wired, ribbed glass, maple floors, yellow pine and oak finish, rolling partitions; cost \$25,000; bids taken by owner in January.

Iowa, Sioux Rapids—The town of Laurens is contemplating building a \$50,000 school house.

Iowa, Tama—Bids received Dec. 20, for 2-story school, 136 x96, brick construction; Chas. A. Dieman, architect, Cedar Rapids, Iowa; A. E. Jackson, secretary.

Minn., Clinton—The new school building is fast nearing completion, F. A. Hancock, contractor, modern, mottled green and brown brick construction.

Minn., Montevideo—Bids received by board of education, C. A. Fossnes, clerk, until 4 p. m., Dec. 29, for a new school building; Wm. B. Ittner, architect, St. Louis, Mo. Officially advertised in this issue of the Improvement Bulletin.

Minn., Verndale—Steps are being taken for the construction of a new school building here.

Mont., Billings—School district No. 10 will build a new school in the spring.

Neb., Ainsworth—A new school house will be erected in district No. 81, frame structure, 18x20.

Neb., Hastings—At a meeting of the school board it was decided to erect an L, with two large rooms to the Longfellow school.

Neb., Oshkosh—The school buildings in district No. 3, recently burned, will be rebuilt; Neils Nelson, director.

N. D., Ashley—The Ashley school building was burned; loss between \$15,000 and \$20,000; insured at \$10,000.

N. D., Devils Lake—Mr. Heller and Mr. Berry of Calvin district were consulting with J. A. Shannon, about plans for consolidated school.

N. D., Doyon—Bids received Jan. 13, 1 p. m., for ventilating, plumbing, and heating the school building, according to plans and specifications on file with F. S. Chamberlin, clerk of board, or at office of architect, John Marshall, Devils Lake, N. D.; check for \$100, payable to John B. La Duc, president of board.

N. D., Grand Forks—Plans are being discussed for the erection of new high school building.

N. D., Hamilton—The Bathgate school building was totally destroyed by fire, insured at \$5,500.

N. D., Mapes—A 1-story frame school will be erected; will mature in spring, F. C. Dunn, Mapes, N. D.

Ont., Port Arthur—A site has been selected for erection of a new school building.

Ont., Kenora—The Kenora town council has asked for an

addition of \$6,153 for the completion of and equipment of new high school building.

Sask., Beinfeldt—School board contemplating erection of a \$2,000 school house; John H. McBeth, treasurer.

Sask., Mervin—The board of trustees of school district No. 3045 will secure site for erection of a \$2,000 school house; H. Grant Dow, treasurer.

Sask., Regina—Norman McMurphy states that plans for the new Collegiate building are being prepared to be erected on north side next year. The Gratten Roman Catholic, separate school board are negotiating for purchase of a new site for school.

Sask., Regina—The Rev. Mr. Millard and Bishop Harding, are interested in establishing a Residential Anglican church school.

Sask., Saskatoon—Public school will be erected; cost \$150,000.

Sask., Saskatoon—Contractors excavated for Mayfair school, brick and stone; ready Sept. 1, 1914.

Sask., Saskatoon—Presbyterian association will erect a \$60,000 college.

Sask., Vawn—School board contemplating \$2,500 school house; H. G. Winger, treasurer.

Wash., Auburn—Preliminary sketches by V. W. Voorhees, architect, Eitel building, Seattle; accepted by board.

Wash., Cheney—Low bid for rebuilding of the state normal school by Bartlett Roth & Co., Portland, \$267,025; lowest bids on plumbing, heating, wiring were above appropriation, and bids will be revised within estimates. Ben Olson, low at heating and ventilating at \$23,000; P. J. Coff, Spokane, at \$13,350; low at plumbing; J. J. Agutter & Co., Seattle, low at electric wiring \$6,960.

Wash., Tacoma—Following bids were received on the proposed stadium building for high school: J. E. Bonnell, bid No. 1, \$62,997; No. 2, \$64,097; F. Berne, No. 1, \$65,400, No. 2, \$70,858; Chamlers & Pearson, No. 1, \$65,581; (2) \$67,371; Boystrom Arnold Co., \$66,741, (2) \$68,741; Butler Construction Co., (1) \$72,000, (2) \$75,000; Knoell Bros., (1) \$73,340; (2) \$74,340; Hans Pederson, \$73,985; (2) \$74,853; Sound Construction & Engineering Co., \$74,229; (2) \$75,640; H. E. Doering, (1) \$74,234, (2) \$75,874; Pearson Construction Co., \$74,584, (2) \$74,898; bids received on electric wiring in Lincoln Park high school: J. J. Agnetter & Co., \$10,860; Meacham & Babcock, \$12,665; Evans-Dickey Co., \$9,887; NePage-McKinny Co., \$10,250; Home Electric Co., \$10,788.

Wis., Appleton—The Orthodox Jewish Congregation let contract for erection of a new school house, 20x24, work to commence at once.

Wis., Merrill—Plans are being discussed for building an addition to the high school building.

Wis., Sheboygan—Work has begun on \$10,000 public school.

Wyo., Worland—Bids received until Jan. 6, for buildings at Wyoming industrial school near Worland; Roase A. Bird, Maley, secretary.

CONTRACTS AWARDED.

Alta., Camrose—Contract awarded to Read, McDonald & Brewster, 613 Tegler block, Edmonton, for the erection of the normal school; plumbing, heating, electrical fixtures and furnishings are not included in the general contract, contracts for these to be let separately; work to start early in spring. J. Stocks, deputy minister, Edmonton.

Iowa, Glenwood—Contract for the new school house to replace the brick school in Center, has been let to A. C. Murphy of Sidney.

Mich., Royal Star—Contract awarded to N. A. Star, 824 Pine st., Lansing, for 2-story school building; plans by S. D. Butterworth, 506 Tussing building, Lansing; cost \$50,000.

Sask., Avonlea—Contract has been awarded to W. H. Richardson for a 2-story school building of brick construction and foundation, architects, Storey & Van Egmond, Regina. T. H. Clay, secretary-treasurer.

BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Retlaw—The McManon Lumber Co. is building a new office building and lumber sheds, and fencing in their yard.

Alta., Edmonton—Dickson Bridge Works contemplating building iron works.

Alta., Edmonton—International Harvester Co., North Battleford, Sask., will erect a warehouse and office here.

Alta., Edmonton—E. F. Hutchinson, Winnipeg, will erect a 6-story, brick building, some time next year.

Alta., Edmonton—Fire destroyed the McKenney Wholesale block, insured, and may be rebuilt soon.

Alta., Grouard—The store of the Northern Mercantile Co. was destroyed by fire and may be rebuilt.

Iowa, Altoona—The warehouse of the Porter Hardware Co. burned; loss \$5,000.

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(Midway)

ST. PAUL

Iowa, Brandon—C. E. Stainbrook is building a new business block.

Iowa, Des Moines—Col. E. R. Moore, Cedar Rapids, banker, was here with his partner, Mr. Anderson, conferring with J. C. Mardis, local contractor regarding plans for a 10-story bank and office building, which they will build in Cedar Rapids.

Iowa, Forest City—Oscar A. Larson will build an addition to his clothing store this fall.

Iowa, Ft. Dodge—Plans are in progress for a 2-story bank building and living rooms for Thor Savings Bank, Thor, Iowa; J. W. Bradford, architects, Fort Dodge, Iowa.

Iowa, Ida Grove—The Pilcher Hardware Co. are building a new business building.

Iowa, Linby—Fire destroyed the general store of Mr. Sheets.

Iowa, Marshalltown—The McCann & Hoover general store and warehouse and four other buildings were burned, at camp of mine No. 30, of Carbon Block Coal Co.

Iowa, Mason City—Kemble & Goodman will build an addition to their floral plant, giving a total of 50,000 square feet of glass.

Iowa, Monona—The Monona State Bank has purchased a site and will erect a new building soon; it will be 2-story, 27x70, plans and specification to be ready as early as possible.

Iowa, Montezuma—E. T. Turner & Son Ray of Turner, Iowa, are wrecking the old Downey building and will build.

Iowa, Montezuma—O. J. Gross will erect a 2-story business building in Deep River.

Iowa, Pocahontas—Owen & Montgomery will build a 1-story machine shop, 26x80.

Iowa, Red Oak—A. R. Tracy and F. A. Kidder have bought a site and will erect a 2-story brick, the lower floor to be used for store purposes and the upper for flats.

Iowa, Story City—The new National Bank building is nearing completion, 44x80; buff Kansas brick construction, 2-story.

Iowa, Waterloo—Contract awarded to Andrew Stiegel for 3-story store building, for Isaac Lebowich; cost \$15,000.

Iowa, Waterloo—Fire damaged the bank building of the Commercial Bank.

Iowa, Waterloo—A new business block will be erected by drew Striegel, Waterloo, stone foundation, Bedford stone, gravel roof, stone cornice, plate prism, sidewalk glass, hard wall plaster, steam heat, (not let yet) maple tile floor, birch finish, boilers, cementing, electric lights, fire escape, fireproofing, hollow tile, iron beams, iron columns, metal ceiling, plumbing, tiling; heating and plumbing to be let Dec. 10. J. G. Ralston, architect, Waterloo, Iowa; cost \$16,000.

Iowa, Waterloo—Permit was granted to F. W. Woolworth to build a 2-story addition to his building.

Minn., Ada—J. F. Priggs & Sons have erected a steel warehouse for storage purposes.

Minn., Albert Lea—Fire damaged the Hansen, Moen & Holday's big implement house; loss on machinery between \$4,000 and \$5,000.

Minn., Alexandria—Ewold Klug is busy erecting a 2-story blacksmith shop.

Minn., Belle Plaine—Contract let to a St. Paul man for erection of a concrete block building for Jos. Widner.

Minn., Brainerd—First National Bank will erect a new brick building; capital \$10,000; J. B. Galareault, cashier.

Minn., Chisholm—Lindal & Sons will build a 2-story business block, brick construction.

Minn., Chisholm—Fire destroyed store of Bropich & Shrep; loss about \$5,000.

Minn., Duluth—Fire damaged the roof of the National Iron Works, to extent of \$500.

Minn., East Grand Forks—Skaren & Olson building will be remodeled; cost \$4,000.

Minn., E. Grand Forks—The Skaren & Olson building will be remodeled; cost about \$4,000.

Minn., International Falls—The Minnesota and Ontario Power Co. have begun construction of a building.

Minn., Kenyon—Swift & Co. have begun cold storage plant.

Minn., Middle River—Fire destroyed building of B. F. Benson, Middle River Hardware and Henry Young's general store, total loss about \$30,000.

Minn., Rochester—R. C. Drips Grocery Co. will erect a wholesale grocery house, 3-story and basement, 44x100, brick and stone construction.

Minn., St. Cloud—Ed. Carlson plans to build a 2-story brick store building.

Minn., St. Paul—Fire damaged Seabury & Co., wholesale grocery house, 3d and Sibley, \$10,000; building owned by Geo. Benz & Sons.

Minn., Thief River Falls—Commercial club have taken up proposition to erect a business block; Math. Barzen, chairman; architect will be engaged to draw plans.

Minn., Tower—Chas. Mike is building a large frame building, 58x24.

Minn., Winona—Foreman O. H. Anderson, plans to have J. R. Watkins building under roof by Jan. 15.

Minn., Worthington—Sam Swanson has completed foundation for a large double store building.

Minn., Worthington—Smith Implement Co. building, 36x60, 1-story, white brick, started.

Mont., Billings—Approximately \$150,000 will be spent by Montana Power Co., on a 4-story office building, to be erected by J. F. Roche, manager, 50x140, concrete and brick construction, fireproof, automatic electric elevators, electric lights, mahogany finish; excavation to start soon; architect to be engaged at once.

Mont., Denton—Denton Mercantile Co. will erect a building.

Mont., Denton—Mrs. Katherine Shields will erect a 2-story store building.

Mont., Eureka—August Rambosek has purchased a site and will erect a modern fireproof business building, next spring.

Mont., Fairview—Johnsgaard & Foess will immediately begin temporary building for a furniture store; will erect a modern brick building in spring.

Mont., Glasgow—Mary Sylte has purchased site and will erect a business building for use as a millinery store.

Mont., Great Falls—Rooney & Austin will build a brick machine shop; cost \$4,000; H. Rooney, builder.

Mont., Great Falls—Architect W. E. Donovan is preparing plans for and excavaton work is now being done on two business blocks, to be erected for Strain Bros., buildings to be connected by an arcade, general contract not let yet.

Mont., Great Falls—Edwin L. Warner received permit to erect a 1-story store building, frame, at 316 8th av. S.; cost \$500.

Mont., Livingston—A 3-story brick store and club rooms will be erected by B. P. O. E. lodge, 50x140; bids being taken by A. W. Miles, chairman of building committee; steel beams and columns, ornamental iron firescape, granite and lime cut stone, pressed brick, electric lights, sheet metal cornice, skylights, galvanized sheet metal ceiling, wood sash and frames, composition roof, patent plaster, plate, art and leaded glass, tile floors, and rubber, marble wainscoting, oak and maple floors, fir finish, one dumb waiter; cost from \$40,000 to \$50,000; C. H. Turk, architect, Livingston, Mont.

Mont., Missoula—Perry Coal Co. intends building, 1-story brick veneer.

Mont., Simms—James Nell will erect a harness building, Banker Smith received plans and specification for building and will ask for bids at once.

Neb., Ainsworth—McHanna Bros. will commence the erection of a brick business building at once, 20x80.

Neb., Alda—Otto Schwartz will build barber shop.

Neb., Angola—Gene Walsworth will build store building.

Neb., Beatrice—Mrs. Huntling will erect a brick block in the spring.

N. D., Fairview—Farmers' State Bank will erect a new building in spring; also the First National Bank of East Fairview.

Neb., Falls City—Two new store rooms on the ground floor will be built behind the Hargrave clothing store.

Neb., Fremont—Old Bijou will be remodeled into a cafe for Vineyard Co.

Neb., Fremont—Work has started on brick business building for A. Borden.

N. D., Grand Forks—Shutt block has been purchased by W. J. Pierce who will remodel same.

Neb., Lincoln—The Shostak 2-story brick business block will be completed next week.

Neb., Lincoln—Permit issued to Lee Broom & Duster for erection of a brick building; cost \$11,000.

Neb., Lincoln—J. E. Miller and B. L. Paine, of Miller & Paine Co. will make extensive building on their property.

Neb., Lincoln—The State Oil Co., at 25th and Randolph sts. is making improvements to its plant; to cost from \$2,000 and \$2,500; concrete substituted for wood, making it fireproof.

Neb., North Platte—Foundation nearly completed for building of Mutual Building & Loan association under supervision of architect, Bert M. Reynolds; cost about \$20,000.

Neb., Omaha—Directors of U. S. National Bank have voted to change plans for rebuilding and enlarging bank building, to build for eight stories.

Neb., Papillion—Permit was issued to Anchor Investment Co. for erection of an ice house.

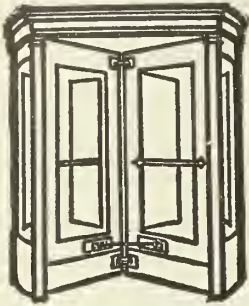
Neb., Tecumseh—Messrs. Graff & Russell will build ice manufacturing plant.

Neb., Wood River—J. R. Jewett will build brick business building.

N. D., Hazen—Gus Schmidt has contract for erection of another shed for the Knife River Lumber & Grain Co.

N. D., Hazen—Citizens' State Bank will erect a modern bank building in spring.

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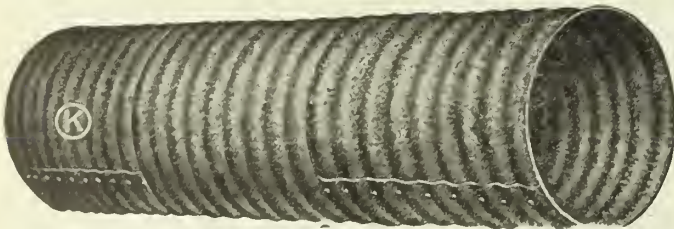
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N. D., Hazen—James Greenleaf is building an addition to his restaurant.

N. D., Wimbeldon—Fire destroyed large hardware store of More Bros., loss estimated at \$40,000.

Sask., Hughton—Fire destroyed the Houghton Mercantile Co.'s building, will be rebuilt.

Sask., Loroburn—Fire destroyed pool room of Mr. Cairem, Mr. Bowman's butcher shop, Mr. Hill's printing office; loss \$11,000.

Sask., Prince Albert—The Massey-Harris Co. will make this their headquarters here, and will erect a large warehouse.

Sask., Rosthern—Fire destroyed part of the Kroll block, and it will probably be rebuilt soon.

Sask., Swift Current—International Harvester Co., Chicago, Ill., will build a large distributing warehouse here.

S. D., Garden City—Business building owned by J. P. Boyd was burned.

S. D., Humboldt—Andrew Miller is planning to erect a large store and warehouse next spring, brick and cement construction.

S. D., Roscoe—Fire destroyed the Hatrlet's hardware store, barber shop and tailor shop.

S. D., Volin—Fire destroyed the store building owned by Newgaard Bros.; valued at \$7,000 or \$8,000.

Wash., Aberdeen—The First State Bank is undergoing extensive remodeling; cost about \$1,200.

Wash., Aberdeen—Fire damaged the Jensen meat market at about \$3,000 or \$4,000.

Wash., Seattle—J. S. Graham is contemplating erection of a 1-story store building, on Pine st.; plans prepared by architect.

Wash., Seattle—Bids are being received by White & Nelson, Hinkley building, architects, for general and sub-contracts for brick and mill construction building on corner of 8th and Pike sts.

Wis., Black River Falls—The Melrose Lumber & Mercantile Co. is building a warehouse for storage purposes, 18x50; Gilbert L. Rockney and Louis Knudtson, contractors.

CONTRACTS AWARDED.

Iowa, Middletown—Sutton Bros. have contract to erect an implement building for D. O. Crawford.

Man., Winnipeg—Contract awarded to Carter-Halls-Adlinger Co. for erection of the Quebec Bank and office building on Portage av. Brown & Vallance, architects, 1006 McArthur building; contracts awarded for following: steel, to Dominion Co., Canada, St. Jean La Varandrye, Winnipeg, millwork, Aaron Carlson, Minneapolis, Minn.; granite, Stanstead Quarries Co., Quebec; metal sash, Hope Sash Co., 45 King st. W., Toronto; electric work, heating and plumbing contracts are not yet let.

Mont., Coffee Creek—Contract awarded to W. T. Sharp, Judith Gap, Mont., for building for J. A. Nickel; cost \$2,000.

Mont., Cubertson—Mrs. Effa P. Goss will erect a business building.

Neb., Havelock—A. L. Busler has contract for stone work on building being built by Bert Jaxson.

Neb., Wauneta—Contract let to Peter Johnson of Holdridge, for brick on new buildings.

Wash., Seattle—Contract awarded to Puget Sound Bridge & Dredging Co. for erection of fireproof loft building, 7-story; cost \$120,000; owner, A. Hambach.

GARAGES AND BARNs

Notes Arranged Alphabetically by States.

Iowa, Forest City—Bert Ley of Germania will build a modern garage, 40x100, brick construction.

Iowa, McIntyre—Work has started on livery barn of Earl Combs.

Iowa, Merville—A stock company will erect a garage here, 50x100; cost \$6,000; F. E. Carrington, president.

Iowa, Shenandoah—Work has started on the Piper's garage, brick construction.

Iowa, Titonka—Ben Kliet is figuring on building a garage.

Iowa, Williams—E. I. Johnson is having a garage and barn built on his lots.

Minn., Adrian—Ground has been broken for the new brick addition to the R. Sells Co. garage.

Minn., Foley—Bids received for the erection of a barn for St. John's church; plans on file at Ramsey store. Building committee, Jacob Schmolke, secretary.

Minn., Kimball—Thos. Hoskins is building a garage.

Minn., Lake City—The large barn of John McGrath of Oakwood was burned.

Minn., Lydia—Frank H. Oldenburg plans large barn, 32x48 next spring.

Minn., Milaca—Wm. Stromberg will build a brick fireproof garage cost from \$8,000 to \$10,000, work to start soon.

Minn., Round Lake—A public garage will be built by Chas. Nienaber, brick, fireproof, 1-story, 48x100, general contract let to Will Shattuck, Worthington, Minn.; architect, C. E. Simms, Worthington; cost \$4,000, walls up.

Minn., Sanborn—P. J. Berndt, carpenter, will build a large barn for Chas. Trapp.

Minn., St. Cloud—A new garage is being erected by J. H. Hurrell, solid brick, modern.

Minn., St. Cloud—Work has started on the building of the feed stable for Varner Bros., of Foley, in E. St. Cloud; 34x100, creosote block floors.

Mont., Glendive—Sheriff F. E. Bacheler is erecting modern barn.

Neb., Lewellen—Frank Taylor will build a concrete garage.

Neb., Superior—A. F. Dahlgren has begun work on his garage.

N. D., Devils Lake—The large horse barn at the Ft. Totten Indian agency was burned, loss about \$6,000.

N. D., Forman—Karl Wiese is building a new 48x54, barn on his farm south of Hample.

N. D., Minnewaukan—Fire destroyed the barn of Wm. Kennedy.

N. D., Moorehead—The Northwestern Mutual Investment Co. will build another large garage here, 100x100, 1-story, built for second story.

S. D., Aberdeen—Fire destroyed the barn of Thomas Ulrich. Loss estimated at \$1,000.

S. D., Belle Fourche—Chas. Beecham is erecting a new barn.

S. D., Flandreau—W. W. Bailey & Sons, Emery and Roy, are purchasing a site for the erection of a modern garage, 50x100, fireproof.

S. D., Sioux Falls—Fire destroyed large barn of E. D. Clark; loss about \$5,000.

S. D., Wagner—T. S. Silvis is building a large barn, 48x60, Joe Piroitke, of Ravina, contractor.

Wash., Puyallup—Fire destroyed the garage here; loss estimated at \$15,000; will be rebuilt at once.

Wis., Gilmanston—The barn on the Ray Loomis farm was burned.

Wis., Edgerton—Frank F. Burgy may build a garage in spring.

Wis., Ironridge—Barn of the Northwestern Iron Co. burned; loss estimated at \$4,000.

Wis., Milwaukee—Fire damaged garage of A. Tinkler, to extent of \$1,000.

Wis., Nekoosa—Fire destroyed the large barn of G. W. Henry.

Wis., Pulaski—J. A. Peplinski will build a foundation this fall for garage, complete in spring, 1-story, 26x125.

Wis., Sheboygan—The E. & H. Motor Co. is having a garage erected at 912 N. 9th st. W. C. Weeks, architect. General contract to Verhulst Bros.; mason work to C. Ackermann & Sons; cost \$4,000.

Wis., Waupaca—Jed South will rebuild his barn recently burned.

MILLS AND FACTORIES

Notes Arranged Alphabetically by States.

Alta., Castor—City council has passed a resolution to raise \$20,000 for gas wells and lighting extension. L. B. Brown, Grand av., is commissioner.

Alta., Edmonton—A resolution is submitted to the city council to raise \$1,200,000 for a gas system, work to include drilling of wells and laying of pipes; mayor, Mr. Short, municipal office; clerk, C. Cox, municipal office.

Iowa, Cedar Falls—Guptill Bros. will build to replace the structure recently burned.

Iowa, Leon—Swift & Co. reported planning packing house here to replace frame.

Iowa, Marshalltown—The Western Grocer Mills is planning to erect a large dairy building here.

Iowa, Sheldon—Sheldon Fixture Co. will erect a 2-story building.

Iowa, Waterloo—Armstrong Manufacturing Co. have begun on a factory building, cost \$50,000, new machinery and equipment will be installed.

Iowa, Waterloo—A concrete block building will be erected by W. Friedl & Son, adjoining their bakery, for a doughnut factory, fireproof.

Iowa, Waterloo—R. E. Peterson has established a factory at Sans Souci for the manufacture of amusement devices.

Man., Carman—Construction of Canada Tile & Fireproofing Co.'s plant being rushed.

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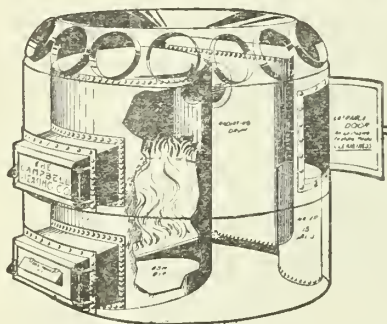
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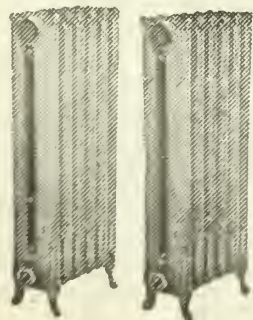
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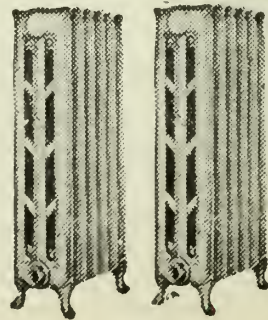
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Minn., Aitkin—A barrel heading plant will be established here. Commercial club interested.

Minn., Finlayson—C. A. Hoaglund's planing mill and saw mill damaged by fire to extent of \$5,000.

Minn., Hibbing—Island farm creamery, G. G. Hartley, Duluth, owner, will be enlarged and an ice cream plant installed. W. H. Beckstead, local manager.

Minn., Litchfield—Illinois parties are considering Litchfield as a location for a second factory.

Minn., Minneapolis—Enlargement of plant will follow deal of H. E. Wilcox Motor Co., which has purchased, H. E. Wilcox Motor Car Co., increased capital stock \$2,500,000, and will add to output of motor trucks. O. P. Briggs, president, 2629 Lake of the Isles blvd.

Mont., Billings—Work has begun on a half dozen flour mills which are to be erected during the winter by the farmers in this vicinity.

Mont., Butte—North Kendall Co. will erect a cyaniding mill here in the spring.

Mont., Dillon—Western Packing Co. of Iowa, reported planning creamery and ice cream factory here; F. Holzelbaker, secretary, Commercial club.

Mont., Glasgow—Work has been begun on a flour mill for Carr & Berger.

Mont., Havre—The Hill Creamery association organized by Al. Thompson, Box Elder, John Bowlsley of this place and others, a creamery will be erected here.

Mont., Libby—Shevlin Neals Lumber Co., Cass Lake, Minn., will erect a saw mill here; capacity 75,000,000 a year. Company will extend logging road. E. H. Dea, superintendent construction.

Mont., Miles City—Prospects revived for brewery here, by Robert Hievert, Milwaukee.

Mont., Park City—The new mill which is being built here will be 50-barrel capacity, capital, \$20,000.

Mont., Plentywood—A. C. Olander has moved his cigar factory from Minot here.

Mont., Wilsall—Geo. W. Monroe will erect a farmers' custom flouring mill here; completed Feb. 1, 1914.

Neb., Nebraska—Hans Lorenzon will erect a butter factory and store building; cost \$5,400.

Neb., St. Libory—St. Libory Lumber Co. will erect a planing mill, 20x48. H. J. Gerdes, manager.

Neb., Tecumseh—Dr. C. W. Graff and Al. Russell promoting erection of a cold storage and ice cream plant, 40x80; cost \$12,000.

S. D., Huron—Hilds Canning Co., Pierre, capital, \$25,000, will erect a factory; Chas. H. Anderson, P. F. McClure and Fred Bonsey.

S. D., Pierre—A site has been purchased and the Ft. Pierre Canning Factory will move its factory.

Wis., DePere—Bert Wilcox will remodel his laundry and install modern machinery.

Wis., Green Bay—An addition is being built to Akin laundry.

Wis., La Crosse—Co-operative packing plant here is to be considered by the Wisconsin organization of the American Society of Equity; cost \$250,000. D. O. Mahoney, Viroqua, Wis., president.

Wis., Ladysmith—D. J. Wittig & Co. may locate a pickle factory here.

Wis., Manitowoc—A 2-story brick addition is being built to the Drost box factory.

Wis., Montello—General Contractors Beauregard Bros., De Pere, Wis., desire further bids on asbestos shingles, mill work, structural iron, Bedford stone, 125,000 common brick; cost \$12,000; foundation in. Parkinson & Dockendorff, architects, La Crosse, Wis.

Wis., Oconomowoc—Fire destroyed the creamery, operated by W. Schilling; loss about \$5,500.

Wis., Rock Elm—C. D. Hawn has foundation in for a saw mill.

Wis., Wausau—Local company will erect plant for spring bearing trucks.

CONTRACTS AWARDED.

Iowa, Emmetsburg—The American Cement Co., of Fort Dodge, Iowa, has let contract for construction of a new building, 60x100, capacity of 600 tons per day.

Iowa, Prairie City—Contractor H. L. Keys, Des Moines, has begun re-building Dowden Potato Plow factory.

Neb., Omaha—Contract awarded to Alex Beck for the erection of new cornice factory for G. F. Epeneter, at 2709 Cumming st., steel and brick construction, 66x88.

CHURCHES

Notes Arranged Alphabetically by States.

Items Marked with Asterisks Not in Daily Sheets.

Alta., Calgary—Jewish congregation plan synagogue; B. Allen, president.

Alta., Edmonton—St. Loachim's congregation will erect a church.

Iowa, Cherokee—The Methodists have purchased additional ground and will build a \$30,000 church, white brick and white terra cotta.

Iowa, Reinbeck—Contract let for church by University Church of Brotherhood at Des Moines, cost \$7,500.

Minn., Fairmont—The Christian Church congregation will build a new church, modern throughout, concrete basement, two upper stories, hollow brick, trimmed with red pressed brick, four pillars of Bedford stone, front windows of colored glass; cost about \$10,000.

***Minn., Fairmont**—\$7,000 has been raised toward fund for Christian church, cost \$10,000.

Minn., Hinckley—The Presbyterians are erecting a modern church; cost \$8,000.

Minn., Mapleton—German Lutheran congregation contemplates church in spring. John Kregel, Wm. Albrecht, committee.

Mont., Park City—A new church will be erected to replace the one recently burned, at Joliet; cost \$3,000; Rev. Calvert, pastor.

***Mont., Savage**—Scandinavian Lutherans will erect a building soon.

Neb., Omaha—The Dunkards church of the Brethren will build a mission in the spring at 22d and Miami st.; cost about \$10,000.

N. D., Forman—Excavation has begun for Norwegian Lutheran church.

Sask., Saskatoon—Roman Catholic church will build; cost \$80,000.

S. D., Hot Springs—Contract awarded to Busk & Wind, of Omaha, Neb., for the combined chapel and hall, at \$30,350; other bids were: Otto Stone, Hot Springs, S. D., at \$35,290; General Construction Co., at Milwaukee, Wis., \$29,970; W. H. Stanley, treasurer and quartermaster.

***Wash., Big Harbor**—A site has been purchased for the new Catholic church and building will begin at once.

Wis., Clintonville—Church will be erected here. Chas. Newhouse, president; Gertrude Brucklacher, secretary.

Wis., Green Bay—Congregational Church association will remodel and build addition to church; cost \$3,500. Architect P. T. Benton; millwork Diekman Manufacturing Co., Green Bay; bids closed on wiring and plumbing, but not on heating, (fan blast); plans in progress; Rev. Edw. A. Ralph, pastor, 518 E. Mason.

Wis., Kaukauna—Holy Cross Catholic church will build new building, soon ready for sketches; cost \$60,000. Msgr. P. J. Lochman, pastor.

Wis., North Fond du Lac—Church of Presentation will build in spring.

ELEVATORS

Notes Arranged Alphabetically by States.

Alta., Calgary—The Farmers' Co-operative Elevator Co. received loan of \$300,000 and 100 more elevators may be erected in 1914.

Mont., Geraldine—D. A. Crichton, cashier of Farmers' State Bank, plans a company to erect elevator, cost \$10,000; construction to begin soon.

Mont., Windham—A farmers' co-operative elevator will be erected here. J. S. Riley, interested.

Neb., Lincoln—Farmers' Elevator Co. of Saunders county will erect a grain elevator at Woodcliffe, Neb.

N. D., Arnegard—Arnegard Farmers' Elevator Co. incorporated and an elevator will be erected next season.

N. D., Cogswell—Plans are being discussed for the erection of a farmers' elevator here; capital stock \$20,000; board of directors: L. A. Dodge, Richard McCarton, L. E. Cole and James Randol.

N. D., Deering—The Cargill elevator was burned.

N. D., Grand Harbor—The farmers' elevator was burned; loss \$20,000.

N. D., Jamestown—A house moving outfit is busily moving the Clendening elevator, from the south side of the Soo tracks to the Midland tracks.

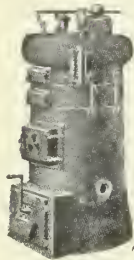
N. D., Stanton—Star Elevator Co. will erect a 40,000 bushel elevator at Zap; sites have also been secured for elevators by this company at Hazen, Buelah and Ollunda. All new towns on the Stanton branch of the N. P.

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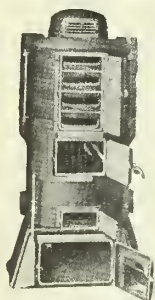
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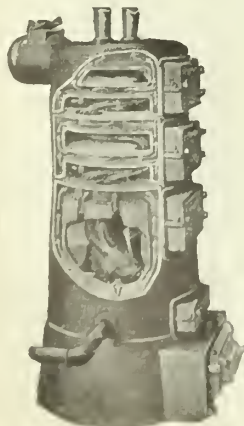
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Sask., Saskatoon—Interior Grain Elevator Co. will erect an elevator; cost \$1,000,000.

Sask., Saskatoon—C. D. Howe, engineer for the grain commission, will superintend the erection of the government elevator here; office at 900 Ross building.

Sask., Tribune—E. McKeene of Ambrose, N. D. will erect an elevator here.

S. D., Veblin—A company was organized for the purpose of building an elevator at Dalberg Siding on the Fairmont & Veblin railroad; officers elected: T. A. Gunnarson, president; Dan Danielson, vice president; J. L. Tjosten, secretary and P. A. Nepstad, treasurer.

S. D., White Rock—An elevator is to be moved seven miles. E. M. Eastman of Litchfield has contract.

Wis., Milwaukee—P. C. Kamm Co. is erecting an elevator here, capacity of 230,000 bushels; to be finished about Jan. 1, 1914.

CONTRACTS AWARDED.

Minn., Crookston—Contract let by Monarch Elevator Co. for elevator to replace one burned.

Neb., Aurora—Contract let to R. W. Vaness Construction Co., Fairbury, Neb., for elevator for Aurora Elevator Co., private plans, wood and structural iron; work to begin at once.

N. D., Hazen—L. Buege has begun work on elevator for the Knife River Lumber & Grain Co.

N. D., Krem—L. Buege, Minneapolis has contract to erect elevator for the Knife River Lumber & Grain Co., 25,000-bushel capacity.

RAILROADS

Alta., Edmonton—Officially announced that surveyors are working on route of Alberta and Great Waterways railway and construction will begin at once 12 miles north of here; J. D. McArthur, president, E. D. & B. C. railway will build the road.

Alta., Edmonton—Financial arrangements reported complete in London to build the Alberta, Peace River & Eastern railway from Hudson's Hope to Pacific ocean via Edmonton and Peace River crossing with branch to Ft. McMurray, 2,300 miles.

Iowa, Cambridge—Petition will be presented to Milwaukee road officers for new station instead of moving old building.

Iowa, Clinton—New office building will be built in North-western stock yards; plans to reach here soon.

Iowa, Fayette—Contract for new station awarded to E. M. Loup, Hopkinton.

Minn., Barrows—Temporary injunction granted, restraining N. P. from building station at Mine, instead of the town.

Minn., Deerwood—Northern Pacific reported to be planning railroad yards here, work to start in spring.

Minn., Lawnsdale—Supreme court ordered new G. N. station affirming order of state railroad commission.

Minn., Little Falls—Following visit of N. P. officials many reports of yard and shop improvements are current.

Minn., Marshall—Citizens are urging a need of a new N. W. station.

Minn., Red Wing—Installation of railroad crossing, safety gates, at three streets recommended to council by citizens' committee, to be in use by May 1, 1914.

Minn., Virginia—Canadian Northern plans to spend \$500,000 in 1914 improving this division, including new modern station, at Cook, Elsmore, Harney, Angora, Sinar, Gheen and Cusson; work on Cook station will begin at once; Elsmore to follow.

Mont., Great Falls—Piper Construction Co. has begun addition of four stalls to Great Northern roundhouse at Clancy.

Neb., Brock—New station ordered by state commission, Missouri Pacific to be completed by July 1.

N. D., Cooperstown—Midland railroad is expected to reach this point next summer.

Sask., Craig—Railroad stockyards will be established here.

Wash., Aberdeen—Contract awarded for spur track to Aberdeen Dock Co., dock to the Pacific Construction Co., Aberdeen.

Wis., Elkhorn—New Milwaukee station will be hollow tile walls, stucco finish, tile interior finish, heavy wood cornice, heating, plumbing, wiring.

Wis., Green Bay—Automobile trucks carrying twenty passengers are announced by Green Bay & Western road to give service in Door county to East Shore summer resorts on Green Bay.

Wis., Madison—Milwaukee road authorized to build from Merrill to Rib Lake, Taylor county, 20 miles.

Wis., Oshkosh—Steps to secure union station for North-western, Milwaukee and Soo are being taken by city club.

Wis., Whitelaw—Petition circulated for new station on N. W.

MISCELLANEOUS

Notes Arranged Alphabetically by States.

Alta., Edmonton—The Dawson Crystal Bath Co. announces that it will expend \$30,000 on a Turkish bath establishment; John Dawson, manager.

Ida., Caldwell—Caldwell Ice & Cold Storage Co. will rebuild their plant at a cost of \$20,000. Martin Jensen, is the president.

Iowa, Waterloo—Lauritzen & Wasson, Inc., have asked to have their contract for the retaining wall along the west bank of the Cedar river cancelled.

Minn., Chisholm—Contract has been made with Gust Anderson for the municipal greenhouse at \$2,781; the heating plant went to the King Construction, North Towanda, N. Y., at \$1,328. Other bidders were Lord & Burnham of Chicago, general contract, \$3,404; heating, \$1,825; John C. Moninger Co., Chicago, material, general contract, \$1,674.57; heating \$1,186.75; for installation of both \$1,300; Adam Schirmer, Chisholm, heating only, installation and material, \$2,185; A. C. Schirmer, heating and installation of same, \$1,728.

Minn., Manganese—Iron Mountain mine is clearing the site for a ew machine shop and boiler house, in which new boilers and machinery will be installed as soon as buildings are completed.

S. D., Yankton—The Gurney Seed & Nursery Co. has begun erection of one of three greenhouses; to be 25x150.

Wash., Aberdeen—An election takes place Dec. 6 to determine as to the proposed improvements of Grays Harbor; the plans contemplate making it one of the great harbors of the Pacific coast.

Wash., Tacoma—A special election will be held Jan. 3, to decide on the issuing of \$100,000 in bonds to build a municipal street car line.

NEW FIRMS INCORPORATED

Notes Arranged Alphabetically by States.

Iowa, Des Moines—National Gas & Traction Co., capital, \$50,000.

Iowa, Elkhart—Keller Hardware Co., capital \$10,000; I. R. Keller, president.

Iowa, Sheldon—Sheldon Fixture Co., Davenport, Iowa, capital \$25,000; H. O. Fritts, president.

Minn., Anoka—Beasecker Manufacturing Co., capital \$30,000; C. V. Beasecker and others.

Minn., Breckenridge—Breckenridge Development Co., capital \$30,000; Louis Gewalt, president.

Minn., Deer River—Deer River Manufacturing Co., capital, \$60,000; Fred M. Scofield and others.

Minn., Duluth—Rossburg Mining & Exploration Co., capital, \$50,000; P. J. Blais and others.

Minn., Duluth—Seavey Timber Co., S. D. Seavey; capital \$10,000.

Minn., Duluth—Douglass Development Co., capital \$50,000; W. C. Towner, John Berger and others.

Minn., Duluth—D. G. Cutler Co.; D. C. Cutler, secretary.

Minn., Hallock—Kittson Mercantile Co., capital \$50,000; Andrew Anderson and others.

PARKS AND CEMETRIES

Notes Arranged Alphabetically by States.

N. D., Grand Forks—Many improvements will be made in the city parks.

S. D., Lead—A site was purchased for the cemetery for the Masonic order.

Wash., Tacoma—Parking of the strip of ground in the rear of Tacoma building will be undertaken soon.

Wis., Maiden Rock—The village board has purchased a tract of land and will convert it into a village park.

RESIDENCES

Notes Arranged Alphabetically by States.

Iowa, Cedar Falls—Abe Wilde will build a dwelling.

Iowa, Davenport—Dr. Dick Harroll, will build a 1-story frame residence, modern; K. H. Cox, contractor; cost \$3,000.

Iowa, Marshalltown—Lawrence Wilkins is putting in foundation for a modern bungalow.

Iowa, Mason City—Fred Hill is laying foundation for a new house. A new house is being built for Chas. Crane.



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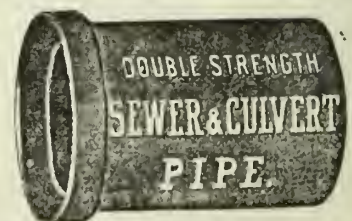
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Iowa, Albia—Contract let to Mark Pabst, for a modern residence for Ben Zaring, on 5th st. and Benton av. E.

Iowa, Albion—John Keefe is remodeling the interior of his house.

Iowa, Belle Plain—Will Struve is building a modern residence.

Iowa, Council Bluffs—A flat building is being erected by Newton Bros. for Julius Keppner, brick, 2-story and all modern; cost about \$4,500. Permit issued to Newton Bros. for a 1½-story residence for Thomas H. James at 219 N. 10th st.; cost \$1,750; permit also issued for erection of a 2-story brick flat, by Henry Meyers, contract to C. C. Norgaard, for brick work, general work let to Newton Bros.; cost \$5,000.

Iowa, Council Bluffs—Permit issued to C. O. Christensen for erection of a 5-room frame residence, at 3403 Avenue D; also for a 1½-story residence at 163 Graham av., cost \$3,000; W. E. Dugger is building a 1-story frame dwelling on 2d av., cost \$2,500; D. L. Linman is erecting a 1-story frame dwelling, \$2,400; a 1-story frame residence is being erected for Paul Van Order, at 29th st. and Avenue C, cost \$1,500.

Iowa, Forest City—R. E. Hensen will build a modern residence.

Iowa, Ft. Dodge—Bids received Dec. 1, for the erection of a 2-story frame parsonage for the First M. E. Congregational society, 32x32; cost \$6,000. Bids received by owner; plans prepared by J. W. Bradford, architect, Ft. Dodge, Iowa; frame, tile fireproofing, artificial cut stone, pressed and hollow brick, hot water heat, plaster, plate and art glass, oak floors and finish.

Iowa, Fort Dodge—Contract for M. E. parsonage awarded to W. L. Kerr, excavation started; J. W. Bradford, architect, Fort Dodge.

Iowa, Grant—John Norcross will build a modern residence.

Iowa, Marengo—Louis Klein will build a modern residence.

Iowa, New Hampton—Contractor W. R. Garland has plans for a new dwelling to be erected for Mrs. Stanton, 30x32, 2-story.

Iowa, Newton—A. C. Newcomer of Newberg is building a residence.

Iowa, Pacific Junction—John Arnold is building an 8-room cottage.

Iowa, Perry—Geo. Gardner is building a modern residence. Engineer John Rogers will build a residence in the near future; E. J. Hullerman will build a house soon.

Iowa, Redding—Fire destroyed the residence occupied by Prof. A. M. Hamilton.

Iowa, Sioux City—Work has started on two new houses for J. C. Casey; cost \$6,000 each.

Iowa, Weaver—Fire destroyed the \$5,000 dwelling of L. A. Stormes.

Man., Winnipeg—Residences to cost \$200,000 contemplated by syndicate who will also be the architects and general contractors; C. W. N. Kennedy, Kennedy building, interested, houses to cost from \$1,500 to \$2,000 each, 102 to be built in 1914; other 102 in 1916.

Minn., Benson—Standal, Dehnert & Christopherson have begun erection of modern residences for Otto Benson and E. A. Weisbeck.

Minn., Grosby—Contracts have been let for the construction of 20 modern dwellings, at Riverton, to be built by the Pittsburg Steel Ore Co.

Minn., Fairmont—S. N. King will build a house.

Minn., Fairmont—Contractor Milbrandt has started excavation for a new residence.

Minn., Fraser—Mrs. Frederick Miller will build a house.

Minn., Gary—Oscar Thordal will build a modern residence.

Minn., Hazel Run—James Jertson has begun excavation for a modern residence, 40x26.

Minn., Hinckley—A new residence is being built by Fred Knowlton.

Minn., Hokah—Walter Klein plans to build a cement brick house in the spring.

Minn., Kenyon—Frank Smith plans to build a residence in the spring.

Minn., Montevideo—Neil Theil is building a house.

Minn., Montgomery—Geo. Humber is having a modern heating plant installed in his residence.

Minn., Moorhead—Contract awarded to W. H. Merritt for erection of the Congregational parsonage.

Minn., Moorhead—Dave Carlson is building a new house.

Minn., Albert Lea—Gunder Gunderson's house was burned.

Minn., Northfield—Mike Soli began work on his new residence.

Minn., Okabena—Olef Luft has foundation in for erection of a large modern residence.

Minn., Plainview—The Catholic parish are planning to build a new parsonage.

Minn., Red Wing—Fire destroyed the home of Elling Bakke of Wanamingo.

Minn., Riverton—Contract awarded to Contractor S. P. Swanson for erection of ten cottages to be built by the mining company; cost approximately \$2,000 each.

Minn., Sandstone—F. M. Clark is building a house, modern.

Minn., Sauk Center—Dick McCollum has contract for erection of a modern residence near Round Prairie.

Minn., Seaforth—Frank Hohman is building a new residence.

Minn., Slayton—J. J. Colson is building a modern residence.

Minn., Ulen—L. Lofgren is building a modern residence.

Minn., Wabasha—H. D. Witte will build a residence.

Minn., Wadena—Wm. Theisen will build a residence.

Mont., Cardin—W. R. Belcher is building a modern bungalow, 36x42, furnace heat, private electric light plant, Pevey Wilcox, contractor.

Mont., Dixon—Mr. R. Elliott is building a new bungalow.

Mont., Fairview—Alex Nicholson and E. E. Matson are building a residence in Richardson addition.

Mont., Girard—I. B. Voigt plans to build a modern residence.

Mont., Glasgow—Andrew Troger will build a modern residence.

Mont., Great Falls—Permit was issued to Wm. DeYoung for a 1-story dwelling, at 709 14th st. N., cost \$1,500; to Austin & Rooney, a 1-story dwelling, 317-319 4th st., cost \$4,000.

Mont., Great Falls—Permit issued to Wm. Tacher for the erection of a 2-story frame dwelling at 137 6th av. N. at \$4,000.

Mont., Missoula—Fire destroyed residence of J. R. Shields; insured.

Neb., Gretna—Contract let to Ernest Timm for erection of a modern residence for Peter Glashof. Grand Island—Walter Rauert will build a new residence. Fairbury—Frank Warren is building a residence, modern throughout. Fairbury—A new residence will be built by Mr. Viette. Clarkson—V. J. Chleboun has foundation laid for residence. Crookston—John Timmerman will build a new house. Wausa—Work has begun on the G. W. Danielson residence. Walthill—Ausley White is building a house. Thedford—Work has started on residence of Frank Wickham. Thedford—Mrs. Ora McMillan will build a modern residence. Tobias—Ed. Zenisek is building a house, 20x40, 2-story, bath room, modern throughout. Seward—C. T. Joern's bungalow is rapidly nearing completion. Sidney—Mrs. A. Lindberg plans to build a modern bungalow in the spring. Grand Junction—Pete Stevens is erecting a modern house. Ainsworth—Chas. Slocum has laid foundation for a new house. Raymond—E. W. Barnes is building. Potter—Arvid Hendrickson of Kirk will build a residence.

Neb., Hampton—S. Bitticks will build a modern house, 2-story.

Neb., Homer—Gus Hingst is building a house. Gretna—Jerry Miles has started erection of a modern house. Gresham—John Lindstrom is building a house for Robert Nelson. Grand Island—Contractor Nelson is erecting a modern residence. Grand Island—Work has commenced on residence of Walter Rauert. Edgar—C. Stayner is building a house. Curtis—Contractor McAlpine has commenced erection of a residence. Ceresco—C. C. Turney is building a dwelling. Crookston—G. B. Fehmerling is building a foundation for a dwelling. Ainsworth—Work has commenced on the M. E. parsonage. Ainsworth—Fred Sisson is building a bungalow. Seward—C. T. Loern is building a new bungalow. Verdigre—A. J. Mastalir is erecting a 30x46 residence, modern. Oshkosh—H. L. Meeker is planning to build a house. Kearney—Foundation for a new bungalow is being laid for Lew Hayward. Kearney—Ray Turner has let contract for erection of a 1½-story residence. O. E. Fitzgerald, contractor. Homer—W. E. Stuteville is building. Sheboygan—Herman Hayssen is building a modern bungalow.

Neb., Lincoln—Miller-Winship Investment Co., 1416 Plum st. frame residence; cost \$2,200.

Neb., Lincoln—Dan McFancy, 1636 S. 13th st. will build a house, cost \$1,500.

Neb., Lincoln—Nellie S. Aldrich, 1719 Pepper st. will build a frame house; cost \$2,000; John Rudeen, 2825 Everett st. frame house, cost \$2,000.

Neb., Omaha—A 2-story residence, 24x32, will be erected by Wilson & Warren, contractors and owners; cost \$2,500; frame and stone, modern.

Neb., Osceola—Swan M. Carlson is building a residence, 23x38, private electric light plant, modern throughout.

Neb., Osceola—Robert Nelson is preparing to build.

Neb., Pierce—A. J. Mastalir has started a 5-room bungalow.

Neb., Wausa—J. E. Baggstrom, architect, Wausa, Neb., states that the fine modern \$9,000 bungalow of G. H. Renard is nearing completion.

Neb., Wausa—Work has commenced on the modern \$2,500 dwelling for chief of police, G. W. Danielson, J. E. Haggstrom, architect, Wausa, Neb.

N. D., Lisbon—Work has commenced on residence for P. H. Rourke, modern throughout.

N. D., Regent—A. E. Christenson is building a new residence, 16x32.

Sask., Regina—C. F. Warde is contemplating erection of a modern apartment house, 5-story, brick and stone construction, brick foundation, electric lights; cost \$40,000.

Sask., Regina—A. M. Fields, care of W. A. Burns, is contemplating erection of a 5-story apartment house; cost \$30,000.

Sask., Regina—Plans have been drawn for a residence for McKenzie & Minshell, Hamilton st., who are also general contractors; 2-story, brick and frame, concrete foundation, shingle roof, electric lights, hot air heat, cost \$4,500.

Wash., Seattle—R. H. Works will build a frame residence at 5537 33d st. for R. D. Hamlin, New York block; cost \$1,050.

Wash., Seattle—The Northwest Bungalow Co., Oriental building, will build a 1-story frame residence at 1430 Lucas Place; cost \$2,250.

Wash., Seattle—Stephen Berg, 1114 3d av., will build a frame residence; cost \$2,500, at 4310 Wallingford av.

Wash., Seattle—E. E. Ellsworth will build a frame residence at 4415 Evanston av.; cost \$1,200.

Wash., Seattle—The American Manufacturing & Building Co., 100 White building, will build a 1-story residence; cost \$2,400.

Wash., Spokane—H. E. Brokaw, 441 17th av., will erect a 1½-story frame residence; cost \$4,000, at 447 24th av.

Wash., Tacoma—Plans prepared by architects, Lundberg & Mahon, Provident building, Tacoma, for the residence for Dolph Jones, contractor, 2-story, full basement, laundry, sleeping porch, hot water heat; cost about \$5,000.

Wash., Tacoma—Construction work has begun on residence for the Franklin Realty Co. at 701 N. G. st., 2-story, frame, modern throughout; A. E. Grafton will soon let contract for the erection of a 2-story, 7-room frame residence, for the Minnesota Investment Co., at 707 N. G. st., work to start about Dec. 1; cost about \$5,000.

Wash., Tacoma—Chas. E. Nelson will build a 5-room bungalow at 1715 S. L. st.; cost \$2,000; S. J. Smith, 1412 S. L. st., builder.

Wis., Chilton—Wm. Kuster will build three new cottages in spring.

Wis., Clinton—E. B. Hawks is building a new house; John O. Hocker is planning to build.

Wis., Fond du Lac—A 1½-story residence will be built by Dr. A. J. Pullen, frame, 27x47, hot water heat, asbestos roof, common, patent and ornamental plaster, plate glass, tile floor, composition tile floors, oak finish, foundation in; day labor; work to be resumed early in spring. J. E. Hennen, architect, Fond du Lac, Wis.; cost \$4,500.

Wis., Green Bay—Work is in progress by Contractor Frank Cuene on the Geo. Thiron's residence, cost about \$3,000; Contractor Louis Everard is at work on residence for Wm. Wehener on Superior st., cost about \$3,000; Otto Vettor is having a new home erected on 3d st., at cost of \$3,000; Wm. Weisner is building a house for himself; R. J. McGeehan is furnishing the heating and plumbing.

Wis., Hillsdale—Tom Quarnderer is planning to build a house.

Wis., Ladysmith—Frank Stevens will build a brick cottage.

Wis., Madison—Permit was issued to John Kelly for erection of a residence; cost \$2,500.

Wis., Madison—A 1½-story bungalow will be erected by E. F. Bean, 133 N. Lake st.; plans in progress, architects, Claude & Starck, Badger Annex; cost \$4,000; 30x36, frame, roof, stucco; architects taking figures about Jan. 1.

Wis., Madison—A 2-story and basement residence will be built by C. H. Allyn, 1105 E. Johnson st. Architects, Claude & Starck, Badger annex; frame, stucco, hardwood finish; cost \$6,500. Architects receiving figures.

Wis., Madison—A 2-story and basement residence will be erected by C. E. Shaffer, Fairchild building; frame, siding, shingle roof; cost \$6,000.

Wis., Madison—A 2-story and basement, 42x45, by W. S. Miller, 803 State st. Plans in progress, Architect Chas. E. Miller, Pioneer building; will take figures about Dec. 10; cost \$12,000; frame, stucco, shingle roof.

Wis., Milwaukee—A 2-story and basement residence will be erected by Emil Koester, 753 Cramer st.; cost \$9,000; 28x50; architect, H. V. Miller, 809 Merchants' and Manufacturing building; hot water heating contract let to Thompson & Harrison, 374 Prospect av.; brick veneer.

Wis., Milwaukee—A 1½-story, 24x36, bungalow will be erected, owner's name withheld, architects, Seibert & Bruceker, 557 12th st. Siding, shingle and roofing; cost \$3,000, architect taking bids.

Wis., Okauchee—The West End Co. has contract for erection of a residence for Miss Marie Turgrimson.

Wis., Sheboygan—Herman Hayssen is building a large modern bungalow.

Wis., Superior—Permits were issued to A. McQueen, for frame dwellings at 838 W. 7th st. and 824 W. 7th st.; cost \$1,500 each.

Wyo., Casper—Architect Homer Shaffer is drawing plans for a 5-room bungalow.



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STREET AND ROAD WORK

Alta., Edmonton—City Engineer Laternel has prepared plans for sixteen subways, costing \$1,160,000, to be built under the main lines of the Grand Trunk Pacific and the Canadian Pacific roads and grade crossings.

B. C., Vancouver—This city expects to pave about four or five miles of pavement next year which has been held back on account of the financial situation in Canada. On 4th av. about one mile will be built partly of wood block and partly of asphaltic mixture, at a cost of about \$213,489; on Hastings st. nearly a mile will be paved with asphaltic mixture at a cost of about \$210,000; on Burrard st., the paving will be laid in two strips, each 22 feet wide, at a cost of about \$144,000; Victoria drive, connecting up a number of streets, will cost about \$217,000; address the mayor.

Iowa, Cedar Rapids—A resolution has passed the council to pave 5th av. and various other streets with brick; address the city clerk.

Iowa, Dubuque—Dubuque county is considering the advisability of an expenditure of \$60,000 in order to secure \$30,000 from the federal government for the improvement of twenty-five miles of highway with a concrete road; address the county auditor.

Kans., Lindsborg—Plans are being made by the city engineer for 5 miles of curbing and gutters; Andrew Norrison, city clerk.

La., Lake Charles—Highway Engineer C. H. Sweetser is making survey of Calcasieu parish from which plans and specifications will be made for the construction of highways under the \$900,000 bond issue; contracts will probably be let in two or three months.

Minn., Brainerd—The city council has adopted a resolution for the paving of certain streets with concrete as follows: Ringwood st., from the east line of 3d st. to the west line of 8th st.; 3d st., north from Ringwood to Holly st.; 7th st. north, from Juniper st. to Bluff av.; V. N. Roderick, city clerk.

Minn., St. Paul—Geo. W. Cooley, state engineer of the highway commission, recently informed Senator H. N. Benson, St. Peter, Minn., that the contracts between the government and the various counties had been approved and that his office is now preparing plans and specifications for the building of the road and that bids would be asked for soon after the holidays, in order to be able to commence work early in the spring as soon as weather permits.

Mo., Springfield—Preliminary plans for about 15,000 square yards of concrete paving are being prepared by C. E. Phillips, city engineer; J. H. Langston, city clerk.

Mont., Judith Gap—A park-to-park highway is under discussion, to extend from the Glacier National Park to Yellowstone National Park, and the Meagher county commissioners have signified their willingness to pay their portion up to a limit of \$3,000; the government is expected to pay half the cost. The road would run through Great Falls and White Sulphur Springs.

Mont., Missoula—Several paving districts are under consideration by the city council.

Neb., Hastings—C. H. Dietrich, owning all but one lot on the south side of one paving district, has requested the council to order paved the alley back of the Bostwick hotel, concrete to be used.

Neb., Omaha—An ordinance is being published providing for the improving of that part of 18th st. from Vinton st. to the north line of Bancroft st. by paving and curbing; Thos. J. Flynn, city clerk.

Texas, Dallas—An election will soon be called to vote bonds for paving a long viaduct; Judge Quentin D. Corley is a member of the court.

Texas, Fort Worth—The county commissioners have adopted a resolution introduced by Commissioner Reeves, setting aside \$25,000 for use in each of four precincts to improve lateral roads therein. Resolution set forth that contract price for eight cardinal and subcardinal roads being \$762,300, a sufficient sum would remain on hand from the \$1,000,000 road bond receipts to allow the expenditure of \$100,000 on the lateral roads in the precincts, leaving \$137,700 surplus for use in finishing roads under contract if needed.

Texas, Rock Springs—Petitions have been filed asking for a special election to vote \$100,000 for good roads; address the commissioners' court.

Texas, San Antonio—Bids for the paving of College st., from Navarro to Losoya sts. have been opened and contracts will be awarded soon. Fifteen bids have been made by four companies, as follows: Alama Paving Co., 3-inch Uvalde asphalt on 6-inch concrete foundation, \$2.31½; same specifications with 5-year guarantee, \$2.56½; 4-inch Uvalde asphalt on 5-inch foundation, \$2.71½; 4-inch Uvalde asphalt on 8-inch

telford foundation, \$2.31½. Texas Bitulithic Paving Co., 2-inch surface on 5-inch foundation of concrete, \$2.50. Coffeeville Brick & Coal Co., brick, with 4-inch concrete foundation, \$2.41; same with grout filling, \$2.51; 14c, will be added to each increase of an inch in foundation thickness. Creosote Wood Block Paving Co., 3½-inch blocks on 6-inch concrete foundation, \$3.46; 3½-inch blocks on same foundation, with 5-year guarantee, \$3.47; 3-inch blocks on same foundation, \$3.18; same blocks on same foundation, with guarantee of five years, \$3.19; 4-inch blocks on same foundation, \$3.63; 4-inch blocks with 5-year guarantee, \$3.64; 3-inch blocks on 5-inch foundation, \$3.02; 3½-inch blocks on same foundation, \$3.30.

Texas, Texarkana—Plans have been submitted to the council by Mayor Kline for paving in improvement district No. 20, including business district and part of residence section, and estimated to cost \$258,000.

Wash., Port Angeles—The city council has voted to improve a portion of Front st. at a cost of about \$25,000; also, for clearing, grading and paving 3d st., at a cost of about \$15,000.

Wis., Superior—A petition has been received by the city commission for the paving of W. 5th st., from L av. to Nettleton av., with a permanent paving on a concrete base.

ELECTRICAL

Minn., Northome—The Northome telephone system has been purchased by Geo. A. Semon and will be connected with the Mizpah system.

Minn., Oak Park—Leon C. Wiley will install a plant and furnish the village with light.

***Minn., Ortonville**—Bids received by C. J. Stark, city clerk, until 8 p. m., Dec. 15, for a switchboard, etc. Officially advertised in this issue of the Improvement Bulletin.

Minn., Thief River Falls—Mayor Lars Backe vetoed the ordinance providing for the disposal of the franchise to the highest bidder for a 25-year telephone franchise, and thinks people should have a right to vote on the matter.

Minn., Thief River Falls—The Minnesota Northwestern Electric Railway Co. have ordered their first power car, which is to be completed and delivered here July 1, 1914. The line is to run east from here, will make the main line about six miles north of Highland and will be completed next summer.

Mont., Red Lodge—The following officers were elected by the recently organized Red Lodge Electric Co., C. C. Bowlin, president, J. N. Tolman, vice president and work will begin on construction of trolley line to Bear Creek early next spring.

Neb., Wausa—The Union Telephone Co. is building a toll line to Bloomfield.

N. D., Elgin—The North Dakota Independent Telephone Co. will extend its lines from Plaza to Parshall and will put in an exchange at the latter place.

N. D., La Moure—The La Moure Light & Power Co., incorporated with a capital of \$24,000; M. A. Erickson, T. A. Curtiss and others.

N. D., Lisbon—The Lisbon Electric Light & Power Co., has been organized with a capital of \$30,000; Frank B. Thompson and others.

N. D., Minto—Poles have been erected for a farmers' telephone line out of here, to be known as the Pulaski Telephone.

Sask., Picnic—Tenders wanted for construction of rural telephone system. Victor Rooke, secretary-treasurer, The Graham-Chatsworth Rural Telephone Co.

S. D., Brookings—Citizens of this city will subscribe \$30,000 of the stock of the Luce Electric Line from Minneapolis, if the road will make this city the terminal point.

Wash., Tacoma—All the poles in the business section will be removed and a luminous arc system installed to cost \$37,000.

Wis., Afton—An electric light plant is being installed at the mill to furnish light and power for the village.

Wis., Fall Creek—This village will build an electric light and power plant, a dam will be built across the creek running through the village.

Wis., Greenbush—Otto Herring will build a concrete dam and put in a dynamo for electric lighting purposes.

Wis., Lodi—The Dane Telephone Co. has been incorporated and it is probable that the central office will be located at Dane, connecting with the Lodi and having a Waunakee exchange.

Wis., Racine—Commercial Club has taken up the proposition of an electric line to Burlington, with the Milwaukee Electric Railway Co.

Wyo., Sheridan—Sheridan County Electric Co. will install cluster lights on the business streets.

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FOUNDATION CONSTRUCTION.

The foundation of a building is the first part of its construction, and by far the most important to be made exactly right. In the latitude of Chicago there is no such thing as a foundation that is safe from frosts unless it extends at least 3 feet 6 inches below the natural grade of the lot on which the building is erected.

Big engineering propositions of foundations for skyscrapers and extremely large buildings are always taken care of by capable engineering research and application, and have been discussed at length by the technical press from time to time. What we are calling attention to now is the foundation problem of the little cottages, the more pretentious residences, or other smaller buildings, of which there are immense numbers, and which constitute the larger part of all construction as well as the main consumption of all building materials.

At the present time the most popular foundation for such a building has come to be the 12-inch concrete wall, which, when properly made, is just about as nearly a perfect proposition for the purpose as can be devised; but not one out of a thousand is properly made. The contractor who takes the job generally figures from the plans of an architect who has never seen the lot and who assumes that the grade line will represent a level surface of the ground. He shows excavations amounting to a depth of 4 feet, so as to give a 6-inch margin. The ground slopes to one corner of the building in nearly every case, so the excavation on the low side will be no more than 6 inches or 10 inches. In fact, it may not extend through the black loam of the surface, and at that corner the building is entirely unprotected from the attacks of frost.

The contractor cannot afford to furnish any more material than he has figured to use in the foundation, for more than likely he has taken the job so as to simply make his own wages by putting in the foundation. Should he deepen the trench on the low side, and add three additional yards of concrete to his foundation, it would amount to his wiping out all the profit as well as his wages for putting in the foundation. The result is that the foundation as put in may be short of cement, but even when there is plenty of cement put into the concrete, the work is done so cheaply that the contractor cannot afford to mix the concrete properly. It is usually just a case of shoveling in some crushed rock, along with a little sand and a little cement to make a spongy, porous concrete which is not worthy of the name and not fit for any structural use.

Naturally, such a foundation has to be first daubed up with plaster on the outside, then it has to be treated with all manner of waterproofing compounds and devices to keep the soil waters from penetrating the wall and so making a wet basement. In spite of all the precautions of waterproofing, close to one hundred per cent of all such foundations are damp, are wet, and will always be unsatisfactory.

Notwithstanding all that has been published and said by technical men on the subject of maxing concrete and making it wet enough so as to puddle the moisture to the surface, very little puddling of concrete is ever really done. The main dependence for securing solidity by the usual foundation contractor is the weight of the material when it is shoveled into the forms. True, the workmen may walk backward and forward, stepping on the material, and so tamping it down with their weight, but it is incomplete, insufficient and unsatisfactory. If this is not remedied it is quite certain that there will be a return to the use of rubble stone for foundation purposes, which will keep the concrete man out of a very large portion of the business which he now enjoys.

Half of the contractors who put in residence foundations proceed by the following method: They will spread out on a mixing board, or on the ground, a yard of crushed rock. On top of this they will spread half a yard of sand; on top of the sand they will spread, fairly evenly, four or five bags of cement. Then they will throw on a few buckets of water and immediately begin to shovel the entire mass into the forms, without any pretense of turning it over or mixing it, claiming that the stuff is all loose and wet and mixes as it goes in. They claim that it is impossible to keep it from mixing, and, consequently, there is no use to go to the expense of paying men to shovel several tons of material two or three times, when it can be done with one shoveling.

This mixing proposition is very seldom improved upon, even when there is a small hand mixer on the job, because it is somewhat of a back-breaking undertaking to grind the crank of a hand mixer, and the laborer who has this part of the work to do does not care a rap about the quality of the material he is producing, and every turn that he can avoid is carefully avoided.

There is no question whatever but that a good solid foundation made of concrete, well mixed, well tamped and properly proportioned, will be just about as tight as a jug.

If it extends down 3 feet 6 inches below natural grade it will be just as safe from frost and in every way as nearly perfect a foundation as can be secured.

When the excavation for a foundation extends 3 feet 6 inches, or even 4 feet below natural grade, it will not be impervious from an attack of frost, unless the back-filling of dirt against the foundation, when finished, is well rammed into place and the dirt piled up a little higher immediately at the edge of the foundation so as to throw the surface water a few inches away from the building.

It would be difficult to estimate the amount of money involved in the damages to buildings where lack of depth of the footing allows the frost to go under the building.

There is an idea prevalent among even experienced contractors that loose dirt from the excavation can be piled up against the foundation of the building, and so built up to make the 4-foot depth to their footing. Made ground is not a protection against frost until it has had from thirty to thirty-two winters even though the footings are placed as deep as sixteen feet in made ground.

Made ground should never be considered as having any value in the placing of the footing of a building. A 3-foot 6-inch or 4-foot excavation below the surface of the natural grade does not indicate that the penetration of frosts in severe winters is limited to that depth. Penetrations of frost into the ground have been found seven and even eight feet. But it does mean that in the usual construction of buildings the quantity of moisture that penetrates through the various earthly strata to the depth of three and one-half feet is not sufficient to form a crystalline arch of ice, which, by contraction and expansion, disturbs the footing of the building. —National Builder.

MUNICIPAL IMPROVEMENTS

A NEW GAS ARC DEVELOPED, FOR WHICH 1,200 CANDLEPOWER IS CLAIMED.

Air gas systems and systems employing kerosene under pressure for use in connection with incandescent mantles are making considerable progress in the rural districts and other places not reached by city gas and electric plants. The former system, however, has had a setback in the increased price of gasoline and the difficulty in obtaining the high grade necessary. A new modification of the latter system consists of a gas arc lamp connected with the fuel tank by a fine flexible bronze tube. Laboratory tests showing 1,220 candlepower are claimed for this lamp, says Municipal Engineering.

The question of street lighting is attracting extraordinary attention. People are no longer satisfied with just enough light to see to move around safely, but are coming to a realizing sense of the advertising and artistic values of ample light. White ways are almost as common as towns themselves, and where the cities do not seem inclined to install them, the merchants put them in by private subscription. The open arc lamp is a back number, and in many cases the enclosed arc, once so universal, is giving place to magnetic or flaming arcs, or to clusters of tungsten lamps on ornamental poles. The old, severely plain iron or wooden pole is rapidly giving way to the artistic post, and there is a strong tendency to recognize the artistic as well as the utilitarian.

While much publicity is being secured to ornamental lighting, the majority of the business, however, has been connected with the ordinary street lighting, which is, in the electric field, practically working in the direction of the use of the luminous arc lamp, and the tungsten filament incandescent lamp. The increased standard of general street lighting has been largely accelerated by the reduced cost of light, and while it has taken on no distinctively new form, the standard of lumination intensity (not necessarily size of units) has been raised very considerably.

PIONEER ELECTRIC LOCOMOTIVES IN ALASKA.

What are claimed to be the first electric locomotives ever used in Alaska were placed in service within the last few months for mining operations by the Alaska Treadwell Gold Mining Co., at Treadwell, Alaska. The two initial electric mining locomotives are each of 6-ton capacity and are operated on a 500-volt direct-current circuit from an overhead trolley. They were manufactured by the General Electric Co. and are of the standard outside-frame type, in which the side frames are placed outside of the wheels. Each machine is equipped with two HM-801 motors having ball-bearing armatures. The motors are mounted in tandem, one motor located in front of the rear axle and the other between the forward axle and the front end frame. The locomotives are operated on the track leading from the central house to the various mills and haul ore trains composed of ten or more trailers aggregating a gross load of about 80 tons. —Engineering Record.

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INDUSTRIAL PROGRESS

ELECTRO-METALLURGY OF STEEL.

The announcement of the inauguration of an electric steel manufacturing plant at Toronto is of particular interest to Western Canada, where there are extensive deposits of iron ores containing impurities which make them unsuitable for blast-furnace practice, but which are specially adapted to electric smelting. The latter process has the faculty of removing these objectionable elements and of producing a grade of steel infinitely superior to the blast furnace article. Electric steel is much more homogenous, free from air holes, and not liable to split or crack like the blast furnace product. These advantages are recognized, especially for rails and such purposes, in the higher price paid for the electric product, says Mining and Engineering of Vancouver.

Electric iron and steel has got beyond the experimental stage in Norway, Sweden, Germany and the United States, and the Canadian Boving Co., with an agency in Vancouver, represents British manufacturers heavily interested in the process. That firm is prepared to treat for its inauguration in Western Canada. The important factor in electric smelting of iron ores is cheap power, and with the numerous waterpowers here running to waste this field offers exceptional advantages for the inauguration of the process.

MINING IN ALASKA.

Blue marble was discovered in cutting the Haines-Porcupine road.

Superintendent Crawford has started up the mill on the Gold King at Columbia Glacier and returns are said to be good. C. Fowlkes, formerly at the Cliff, is superintendent. A gold brick worth \$20,000 has been produced.

The Granby Consolidated Mining & Smelting Co. have purchased the Midas on Solomon Gulch, opposite Valdez, the amount being \$125,000. The Guggenheim interests had a bond on it last year but did not take it up.

A five-stamp Allis-Chalmers mill is being installed by E. McConnell near Ketchikan.

The Granby Consolidated Mining & Smelting Co. has bonded the Hadley property on Prince of Wales Island.

Development work is being done on the Whitney-Case-Judson-Harper gold-quartz claim on Grant Lake Seward.

Joseph Ray claims to have located a vein 300 feet wide and carrying free-milling ore at Healy river.

B. L. Thane is testing for dredging some placer locations on Kenai Peninsula.

In the Golden Group at Port Wells, development work has proved a vein two to four feet wide of blue quartz carrying fine gold.

The Fidalgo-Alaska Copper Co., which shut down in May last, has resumed work and will open a stope from the middle adit to develop a body of ore estimated to run seven per cent copper. C. W. Harrington, formerly of Slocan, is manager.

The site for the mill at the Sea Coast Mine at Shoup Bay is being got ready for the mill and equipment which are on the ground. The property is a mile from the Cliff. A power plant is being put in to serve neighboring plants. The mill is a five-stamp battery of 1,000-pound stamps of Hallidie make with 7x9 Blake crusher, automatic feeder and Wilfley concentrator. The power plant will be located in a powerhouse thirty-four feet long by twenty-two feet wide, equipped with two 5,000-volt, three-phase, sixty-cycle generators developing 250 horsepower. Water will be brought from an elevation of 320 feet through a sixteen-inch pipe line, 1,250 feet long reduced to ten inches at the delivery end. The vein is five feet wide and is stated to average \$17.50.

Fifty dredges had at work during the summer months at Nome and neighboring camps.

The dredge working on the tin deposits north of Nome took out sixty tons this season of a value of between \$20,000 and \$50,000.

ENORMOUS ECONOMIC EFFECT OF AUTOMATIC SPRINKLERS.

Nearly \$1,000,000,000 should be charged to the credit of the automatic sprinklers of one company alone in insurance premiums saved, also the interest on the savings, and fires avoided since 1877. A large proportion of this saving is the result of the great expansion in the use of automatic sprinklers during the last ten years. The development of this one company is typical of others. The company has installed 18,000,000 sprinklers. The fires extinguished by its devices number about 18,000.

BUSINESS INFORMATION

In this section will be found information relating to new devices and methods of construction; also mention of late catalogues issued by manufacturers of building materials and equipment.

Any catalog mentioned here can be seen at the office of The Improvement Bulletin, 912 Lumber Exchange, Minneapolis, where a complete file is kept.

A complete illustrated price list of duplex joist hangers, post caps and Cleveland wall ties is published by the Duplex Hanger Co., of Cleveland, O., and may be had free from their local agents, the Avery Steel & Iron Co., Minneapolis, Minn.

The insulation of concrete is a subject that is attracting much attention nowadays. It is completely treated in a booklet by that name which the Hydrex Felt & Engineering Co., of 120 Liberty st., New York City, get out. The book is well illustrated with photographs and is a document of value to the engineer and contractor.

The contractor is often asked what he knows about floors in putting up new homes nowadays and he sometimes fails to have the answer ready. But "Beautiful Floors, Their Finish and Care," a publication of the A. S. Boyle Co., Cincinnati, O., will answer all his questions. It tells about the application and use of Old English Floor Wax and has many good hints. Sent free on request.

The catalogue of the American Enameled Brick & Tile Co., New York City, is a regular work of art with its colored pictures of the different shades of enameled brick and its careful drawings of the various shapes and sizes of their products. You can get a copy from the Belt Line Brick Co., Minneapolis, Minn., the local agents for the above company.

Van Expansion Bolts and other specialties are completely described in the Van Handbook of Specialties. This interesting little catalog is carefully gotten up and may be had free on application to the Van Expansion Bolt Manufacturing Co., Chicago, Ill.

Alba Glass for illumination is beautifully pictured in the new book of the Macbeth-Evans Glass Co., of Pittsburgh, Pa., by that name. Old Greek art is suggested in the many designs for shades and electrolliers and the book is one which the architect can refer to with profit occasionally. Sent free on request.

A regular dictionary for the contractor is printed by the Standard Scale & Supply Co. of Pittsburgh, Pa., and it is sent free. The list of goods described and photographed in the book is a very long one, including concrete mixers, hoisting engines, derricks, motors, road drags, scrapers, graders, buckets and wagons and so on. Really a very good publication.

The Western Wheeled Scraper Co., of Aurora, Ill., is willing to send on request one of the most artistic catalogs of road machinery we have seen for some time. It describes Western Machinery for handling earth and stone and the pictures are the main feature of the book. They show dump cars, flat cars, plows, etc., in actual operation and give a good idea of what the machinery will do.

The handy little handbook of Sash, Doors & Blinds published by the Kuhn Sash & Door Co., of Minneapolis, is the official list of the wholesalers of the northwest. It is a regular little encyclopedia and is well worth writing for. Sent free to builders and contractors.

A HOSPITAL WITH GLASS ROOMS.

A new problem in the design of heating and ventilating equipment will be presented when Chicago's new \$300,000 isolation hospital is constructed. Among the novel features of this building will be glass hospital rooms, equipped with telephones, permitting persons recovering from contagious diseases to be visited by relatives and friends. The patients, rich and poor alike, instead of being herded in wards, as is now done, are to have separate rooms, each room or cubicle to be enclosed with glass.

The hospital is to be in the Twelfth ward on a 27-acre site at Marshall boulevard and 31st st., if the city is able to get title to the land. The ward buildings, all to be four stories high, are to be grouped in circular shape, facing Marshall boulevard, with the administration building in the center.

In the ward buildings, corridors eight feet wide in the center of each floor, are to form the means of visiting and conversing with patients. Each glass room adjoins this corridor. Outside of each room is to be a telephone instrument, protected from infection, connected with an instrument in the patient's room.

The plans have been drawn by City Architect Charles W. Kallal.

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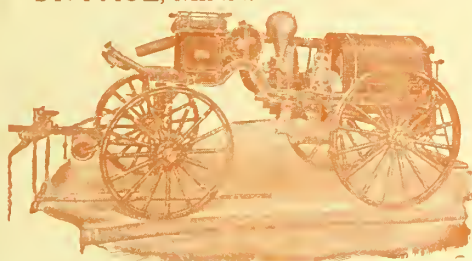
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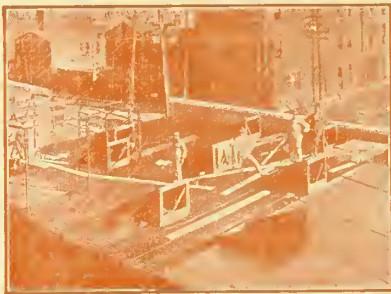
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1	Landers-Morrison-Christensen Co., Minneapolis	52	Central Supply Co., Minneapolis	48	Pioneer Granite Co., St. Cloud, Minn.
50	Gust Lillyblad, Red Wing, Minn.	42	National Mfg. & Supply Co., Minneapolis	48	Sauk Rapids Granite Co., Sauk Rapids, Minn.
8	Shakopee Cement Lime Manufacturing Co., St. Paul		REVOLVING DOORS	48	Wm. Penn Stone Co., Minneapolis
50	Speakes Lime & Cement Co., Superior, Wis.	34	Van Kannel Revolving Door Co., St. Paul	48	The Widell Co., Mankato, Minn.
1	St. Paul Lime & Cement Co., St. Paul		ROOFING GRAVEL AND ASPHALT.		STRUCTURAL SECTIONS AND SHEETS
1	Standard Salt & Cement Co., Duluth	36	Griffin & Boehme, St. Paul		Inland Steel Co., St. Paul
1	The Northwestern Lime Co.		H. W. Johns-Manville Co., Minneapolis-Milwaukee		TANKS—STEEL.
	MANTELS—GRATES.	36	Krieger-Jamar Co., Duluth	6	American Bridge Co., Minneapolis
42	Drake Marble & Tile Co., St. Paul-Minneapolis	51	Minnesota Roofing & Cornice Works, St. Paul	52	Central Supply Co., Minneapolis
51	Dunlop-Moore Co., Duluth	1	Northwestern Lime Co., St. Paul	6	Minneapolis Steel & Machinery Co.
42	Northwestern Marble & Tile Co.	36	Scribner-Libby Co., St. Paul		TERRA COTTA.
7	Twin City Tile & Marble Co., Minneapolis	34	Selden Roofing & Manufacturing Co., Mpls.	10	Johnson, Jackson & Corning, Minneapolis-St. Paul
	MARBLE, TILING, MOSAIC.	46	Thomson-Williams Co., Duluth	46	K. F. Lott & Co., Minneapolis and St. Paul
42	Drake Marble & Tile Co., Minneapolis-St. Paul		ROOFING—METAL.	2	Ranson, Birtram W., Minneapolis
51	Dunlop-Moore, Duluth		Badger Steel Roofing & Corrugating Co., La Crosse		VACUUM CLEANERS.
42	Northwestern Marble & Tile Co.	34	Duluth Corrugating & Roofing Co., Duluth	32	R. M. Laird, Minneapolis
46	Thomson-Williams Co., Duluth	34	La Crosse Steel Roofing & Corrugating Co., La Crosse		VENTILATING SYSTEMS.
7	Twin City Tile & Marble Co., Minneapolis	24	St. Paul Roofing, Cornice & Ornamental Co.	38	Hackney Ventilating Co., Minneapolis
	METAL SHINGLES.		ROOFING MATERIAL.	38	Charles Wilkins & Co., Minneapolis
51	Milwaukee Corrugating Co., Milwaukee	17-19	Barrett Mfg. Co.		VARNISHES.
	METAL AND WIRE LATH.	2	Corrugated Bar Co., St. Paul	52	North Star Varnish Co., Minneapolis
2	Corrugated Bar Co., St. Paul	51	Krieger-Jamar Co., Duluth	52	Twin City Varnish Co., St. Paul
2	Ranson, Birtram W., Minneapolis	32	John Leslie Paper Co., Minneapolis		VALVES.
10	Johnson Jackson & Corning Co., Minneapolis-St. Paul; also Rolling Partitions	32	H. W. Johns-Manville Co., Minneapolis-Milwaukee	52	Central Supply Co., Minneapolis
1	Northwestern Lime Co., St. Paul		ROOFING AND SIDING--IRON AND STEEL	40	Crane Co., Minneapolis
1	St. Paul Lime & Cement Co.		Inland Steel Co., St. Paul	40	Crane & Ordway Co., St. Paul
46	Thomson-Williams Co., Duluth		RUBBER SHINGLES		VAULTS.
	MILLWORK.		Standard Salt and Cement Co., Duluth, Minn.	16	Diebold Safe & Lock Co., St. Paul
32	Baxter Sash & Door Co., Duluth, Minn.		RUST-RESISTING IRON SHEETS	16	Heilig & Elliott Co., Minneapolis
32	Osgood-Blodgett Manufacturing Co., St. Paul		Inland Steel Co., St. Paul		Herring-Hall-Marvin Safe Co.
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	Farnham Printing & Stationery Co., Minneapolis		Herring-Hall-Marvin-Safe Co.		WASHING MACHINES
	ORNAMENTAL IRON AND WIRE.		SAND AND GRAVEL.	32	R. M. Laird, Minneapolis
9	Builders Iron Works Co., St. Paul-Minneapolis		Standard Salt and Cement Co., Duluth, Minn.		WATERPROOFING
6	Davenport Machine & Foundry Co., Davenport, Ia.		SEWER PIPE AND DRAIN TILE.	38	H. W. Johns-Manville Co., Minneapolis-Milwaukee
9	Demeules Bros., Minneapolis		Ingalls Stone Co., Bedford, Ind.	46	K. F. Lott & Co., St. Paul, Minn.
9	Midway Ornamental Iron Works, St. Paul		Iowa Sewer Pipe & Tile Co., Des Moines		WATER TOWERS, STEEL.
6	Minneapolis Steel & Machinery Co., Mpls.		Northwestern Lime Co., St. Paul	6	Minneapolis Steel & Machinery Co., Minneapolis
6	St. Paul Foundry Co., St. Paul		Plymouth Clay Products Co.		WINDOW SCREENS--METAL FRAME
	PAINTS, FILLERS, ETC.		Red Wing Sewer Pipe Co., Red Wing	32	O. F. Symons & Co., Minneapolis
6	Ricketson Mineral Paint Works, Milwaukee		Standard Salt and Cement Co., Duluth, Minn.		WINDOW SHADES---WASHABLE
	PACKINGS AND HOSE		SHEETS--IRON AND STEEL	8	National Window Shade Co., Minneapolis
	H. W. Johns-Manville Co., Minneapolis-Milwaukee		Inland Steel Co., St. Paul		WIRE AND IRON WORKS.
36				9	Builders Iron Works, Minneapolis, St. Paul
	PAVEMENT.			9	Demeules Bros., Minneapolis
8	Barber Asphalt Paving Co., Des Moines, Ia.			9	Midway Ornamental Iron Works, St. Paul
17-19	Barrett Mfg. Co.				WEATHER STRIPS.
	PIPE AND BOILER COVERING			9	Metal Weather Strip Co., St. Paul
36	H. W. Johns-Manville Co., Minneapolis-Milwaukee			32	O. F. Symons & Co., Minneapolis
					WOODWORKING.
				44	G. E. Ingersoll, St. Paul

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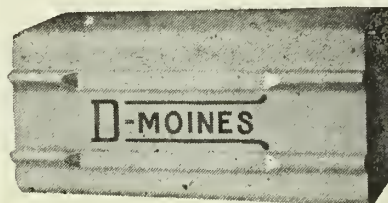
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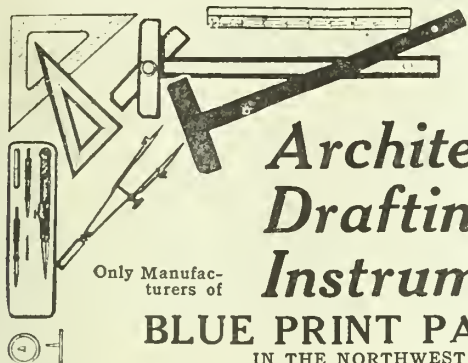
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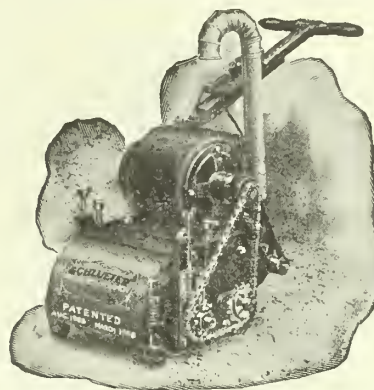
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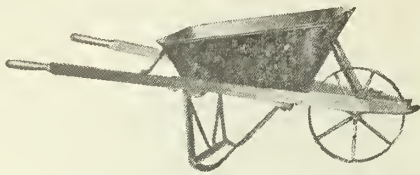
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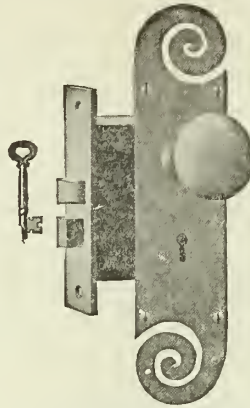
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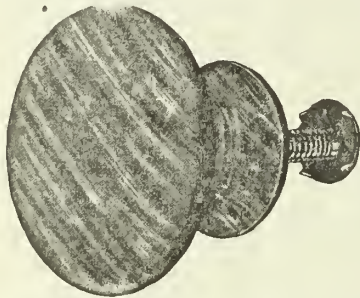
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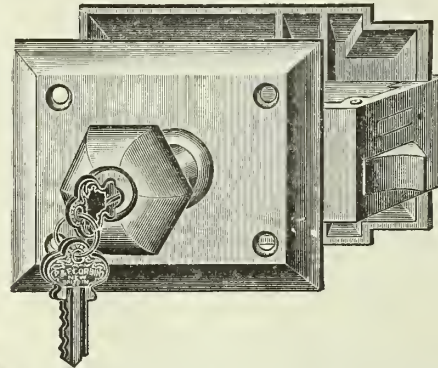
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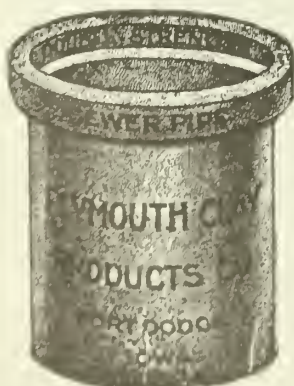
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The IMPROVEMENT BULLETIN

VOLUME XLVII.

SATURDAY, DECEMBER 20, 1913

NUMBER 3

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EDITORIAL

O. L. COLBURN, Editor

REGARDS HANOVER SCHOOLS AS BEST.

An Omaha architect, John Latenser, who spent the summer and fall in Europe studying school architecture, says he found the best schools in Hanover, Germany. The allotment of space in these is interesting; one-third to gymnasiums, one-third to manual training or technical education and one-third to general instruction. Mr. Latenser says: "The doctor is one of the established pieces of furniture, having two rooms in the building, and every child is examined," he says. The schools in which the division into thirds were found were of the latest progressive class like the newest American high schools.

CARNEGIE SAYS BUSINESS WILL BE BETTER THAN EVER.

Andrew Carnegie who called at the White House last week to see President Wilson and found him ill in bed, told newspaper men that business conditions would be better than ever after the new legislation which congress has in hand is passed. It is generally admitted that the weight of a man's business prediction is in exact ratio to his business experience and success. Mr. Carnegie is a self-made man.

THANKS AND GOOD WISHES.

With the warm and balmy breezes blowing in our open window, it is hard to realize, by glancing at the calendar, that the great day of merry making, of ice, snow and mistletoe is almost here. But so it is.

And with full appreciation of what you, our readers and advertisers, have done for us in the past year, we wish to add a word to the many wishes you are now receiving for a pleasant Christmas.

In living up to the ideals of The Improvement Bulletin, as expressed by its founder twenty years ago, we have made constant endeavor to secure improvement. A direct appeal to our readers for useful suggestions this year, brought us hundreds of helpful letters, the hints from which have been used in improving our news service and the physical appearance of the paper.

We feel that we now have a paper that conforms nearer than ever to your wishes. This is proved by the fact, that, after we submitted the improved Improvement Bulletin to your inspection, you showed your approval by getting your friends to subscribe. As a result, our circulation receipts this year have been doubled.

The volume of building operations recorded during the year, although not so great as some expected, and the large number of new firms that have been organized in the Northwest indicates that this territory is on the threshold of a period which will leave behind it a record of unprecedented development.

We trust to keep pace with it in such a manner that our readers and advertisers will continue to give us, in constantly increasing measure, the friendly support they have so loyally yielded us in the past.

ABOUT CONCRETE MIXERS.

We start in this issue a series of short articles describing the leading makes of concrete mixers. As we have on our subscription list, two out of every three contractors in the Northwest, more of whom are doing concrete work every day, we feel that these facts about mixers will interest them.

There are so many different kinds of concrete work done nowadays and so many different kinds of mixers manufactured that it is sometimes hard to select the best one. It is seldom that the contractor finds the advertising announcements of all the concrete mixers in any one publication and so, in depending only on those firms to supply him, whose advertising he sees, he may overlook the very firm making the mixer he needs.

The best plan is to bring together in one place the announcements of all the manufacturers for the new year, and then the contractor can look over the entire line and pick out the mixer best adapted to his requirements.

Watch The Bulletin for the latest news about mixers. These articles will continue for several weeks.

CEMENT BUSINESS LOOKS UP.

Since the removal of the duty of eight cents per 100 pounds on cements, says Rock Products, under the old tariff regulations, Galveston is preparing to handle large quantities of cement which will probably be brought into Galveston for shipment to interior points. Galveston is accustomed to the handling of vast quantities of cements, for in the building of the great Causeway 81,500 barrels of cement were used, and 28,500 barrels of the product were consumed in the building of the seawall. Numerous public buildings and residences have been constructed of concrete, but all this cement was imported for local consumption.

MORE INQUIRY FOR STEEL.

While the rate of rolling-mill and steel-works operations is less than that of a week ago, says Iron Age, inquiry for some forms of finished steel has increased enough to bring out a note of hopefulness in some quarters. It is beginning to be realized that 50 per cent operation is below the wear-and-tear line in consumption, and that while buyers wait, the country's needs are accumulating, as they have before in similar situations.

There is also in all markets more inquiry for spikes, angle bars, tie plates and other track fastenings, indicating that a number of railroads are planning for a fair amount of track laying. One road is in the market for 30,000 kegs of spikes.

Interesting Details Of a Great Railroad Station.

Facts About the Great Northern Depot, Minneapolis, to be Opened Soon.

Items of the station power house:

Boiler horsepower installed, 900 horsepower.
Boilers are equipped with Foster superheaters to raise temperature of the steam 70 degrees F. above that due to 153 pounds pressure.
Coal handling machinery of capacity to handle 25 tons per hour.
Chimney 78 inches in diameter and 200 feet high.
Six ventilating fans which will move 71,000 cubic feet of air each minute.
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Capacity of electric motors for various purposes, 160 horsepower.
Incandescent lamps installed equivalent to 133,700 candle power exclusive of power house.

It being one of the integral parts of the problem in connection with the new Minneapolis station of the Great Northern to supply service for light, heat, power, etc., the company as part of the extensive undertaking, determined upon building and operating its own service plant. The power house where all the electricity will be generated is on the bank of the river 750 feet north of the passenger station. The design is following modern ideas and the equipment is high-class and complete for the intricate service demanded by a great railway station which includes the entire lighting of the station approaches, power for operation of mechanical ventilation, elevators, vacuum cleaning, refrigeration, storage battery, baggage trucks, pumping machinery, the heating of the building and of standing trains as well as heat and electricity.

Exhaust steam from the engines is utilized for the heating of the station building and the pipes for conveying this from the power house to the building are carried in an overhead runway built as part of the main east trucking tunnel. The station is heated by direct radiation with the exception of the main waiting room which is both heated and ventilated by a mechanical hot blast system. All rooms on the first floor and the dining room and kitchen on the second are ventilated as well as all toilet rooms throughout, by mechanical means. Outside air is taken into the fans from a high point of the building as free from dirt as possible, and after passing over tempering coils it is thoroughly washed to cleanse and purify it and then heated and discharged through duct system to the various rooms to be ventilated.

This system is comprehensive in that it is completely equipped with automatic regulating and controlling devices to maintain an even temperature in all rooms. The exhaust from ventilated rooms is most complete. Special attention has been given to all rooms used by the traveling public that an adequate supply of clean washed air will be delivered to rooms and vitiated air removed. A supply of 33,500 cubic feet of fresh air will be delivered each minute to the rooms; 12,000 to the main waiting room.

THE GENERAL LIGHT PLAN.

In the general scheme of lighting relatively small units are used rather than powerful arc lamps. The space and particularly the main waiting room and the train concourse will be well illuminated without being overdone and as tungsten units are to be used the lighting will be soft and evenly distributed. The passenger elevators and stairway lighting to train platforms has been given special attention. An arrangement of recessed lamps and reflectors has been devised to throw the light directly on to stair landings.

Complete refrigerating plant is provided for cooling drinking water. The water is passed through sand filters and then to special filters containing filter paper. After being cooled to 38 degrees F. the water is pumped by electrically driven centrifugal pump through a special system of piping to conveniently located sanitary bubbling fountains where an ample supply of cold filtered water will always be available.

No station would be complete without its vacuum cleaning plant and one of the most efficient type and of large capacity has been included.

Telephone booths for the use of the patrons of the roads have been liberally provided and each is equipped with a ventilating fan which with the light is automatically switched on by the closing of the booth door.

Besides the latest electrical devices the barber shop is also supplied with compressed air which air is first taken from the outside and filtered before being compressed.

A system of signalling by means of lamps has been devised between the conductor on the platforms and the gate-man in the concourse, to facilitate the movement of trains and at the same time prevent possible accident by admitting passengers to stairways after a train has started.

MEMORANDUMS OF QUANTITIES IN THE GREAT NORTHERN STATION.

8,000	cubic yards excavation.....	\$7,000
100,000	cubic feet concrete.....	33,000
350,000	light grey press brick.....	17,500
2,250,000	common brick	31,500
45,000	square feet reinforced concrete floor.....	20,000
150,000	square feet concrete deadening.....	7,500
15,000	square feet concrete column and girder covering	6,000
18,000	square yards Portland cement plastering in trucking galleries.....	15,000
10,000	tons of hollow tile fireproofing.....	60,000
4,000	tons structural steel.....	225,000
40,000	cubic feet cut stone.....	80,000
25,000	square feet of marble and tile work.....	50,000
500,000	pounds ornamental iron work.....	50,000
	Copper skylight and roofing.....	21,000
	Rough carpentry and wood floors.....	20,000
	Ornamental terra cotta.....	4,000
	Plain and ornamental plastering.....	35,000
	Interior finish	15,000
	Painting and finishing.....	9,000
	Hardware and kick plates.....	7,000
	Glass	3,000

\$716,500

The building is designed in the style of the Italian Renaissance, the Roman Doric order being used in the colonad-



Where Omaha Cement Show Will be Held.

OMAHA CEMENT SHOW.

The Eighth Annual Mid-West Cement Show will be held Jan. 30, 31, Feb. 2, 3, and 4, 1914, at Omaha, Neb. A large amount of space has been engaged and the secretary, Frank Whipperman, says that it will be the best show of the year. The visitors to the show will come in contact with architects, contractors and cement users from the middle west. Mr. Whipperman says: "If you have a good thing and want to interest others, here is the place to exhibit it. The expense is small, compared with the benefits derived." A plat of exhibit space can be obtained from the secretary, Frank Whipperman, 28th av. and Sahler st., Omaha. The show is under the management of the Nebraska Cement Users' Association.



NEW GREAT NORTHERN STATION NEARING COMPLETION.

ed front. Flanking the central collonade are monumental arches defining the passenger entrances to the station. From these entrances direct access is given to the enclosed train concourse. This arrangement preserves the quiet and restful character of the main waiting room.

The lunch and dining car department is located on the floor above that of the main waiting room with easy access both by stairs and passenger elevator.

All checked baggage, mail and express will be conveyed through an elevated trucking gallery connected by elevators with the track platform at the forward end of trains, thus practically eliminating the use of trucks in the portion of the platforms occupied by passengers.

Some of the important dimensions of the building are as follows: Main building, including baggage wing, 154 feet by 297 feet; main waiting room, 62 feet by 155 feet; concourse, 44 feet by 252 feet; smoking room, 52 feet by 27 feet; women's room, 27 feet by 3 feet; dining room, 41 feet by 62 feet.

MATERIALS.

Exterior of the building, tooled Kettle River sandstone from the quarries in Sandstone, Minn.; trucking galleries and stairs to platform level, of reinforced concrete construction; power station and stack exterior of brick; main building, trucking galleries and power station are fireproof; use of wood throughout has been reduced to the minimum and consists principally in doors and narrow casings; entrance and inner vestibules, floors of art marble tile, walls wainscoted 6 feet in height, polished Tennessee marble, above this point hard plaster; door frames and ornamental portion of booths ornamental cast iron; main waiting room floor art marble with borders, walls wainscoted 6 feet in height, polished Tennessee marble, above this panelled plaster treatment; door frames and booths around waiting room ornamental cast iron; women's retiring room art marble floor, wainscoting mottled gray Vermont marble, plaster treatment above; smoking room

De Smet marble cement floor tile, wainscoting Tennessee marble; dining room marble floor tile, Vermont marble wainscoting, plaster panelled treatment above with plaster beam ceiling. Where wood work becomes necessary in the form of doors and casings around same, these to be selected white oak, stained to harmonize with the general color treatment of the building.

MEMORANDUMS OF QUANTITIES IN CONNECTION WITH THE POWER HOUSE.

Fifteen thousand cubic yards excavation, \$15,000; 130,000 feet concrete, \$35,000; 700,000 common brick, \$10,000; 50,000 pressed brick, \$6,500; 400 tons structural steel, \$25,000; 70,000 pounds ornamental iron, \$7,500; 8,000 cubic feet reinforced concrete with coal and ash hoppers, \$16,000; copper skylights and roofing, \$2,000; Fenestra steel sash, \$2,000; plumbing, etc., \$2,500; ornamental terra cotta, \$4,000; painting and finishing, \$750; glass, \$500; mechanical equipment, \$101,250; mail and express building, \$200,000; track work, \$600,000; total, \$1,028,000.

ROOF GARDENS ON CHURCHES.

Cedar Rapids, Iowa, may set an example which many churches will follow. The building committee of St. Paul's Methodist Episcopal church in that city adopted plans for a \$100,000 church, which included a pergola roof garden. Moving picture entertainments and ice cream socials can be held there. One of the obstacles to the scheme met with by the building committee was the cost of the heavy, promenade tile roof, which required a stronger building construction to carry the great weight, but they learned of a kind of slate, which not only overcame the weight problem but reduced the cost of the roof to one-half, while it furnished them a fireproof, stone pavement that could be used for all the practical purposes they intend to use this roof for. It was first proposed to use composition, and put board platforms over this but the building committee didn't approve of this form of construction. Canvas and other kinds of roofing were considered but all had their objections.

TURNER WINS A SWEEPING DECISION

United States Court Decides for "Mushroom" System in Concrete Patent Suit.

The decision just rendered in favor of the defendant, C. A. P. Turner, in Equity Case No. 1083, in the U. S. District Court, is of interest to all engaged in the building business.

Nearly seven years ago the first successful flat slab and column construction was completed in the city of Minneapolis, designed by C. A. P. Turner, of this city, and erected for the John C. Johnson wholesale grocery company. This building was the turning point in the history of reinforced concrete construction in the development of a new and wonderfully popular type of building of which Mr. Turner himself since that date has designed over 2,000 structures scattered throughout the United States, Canada, Australia, India, Porto Rico, Holland, etc.

In the early development of this novel construction, engineers did not believe it could carry the dead weight of the materials of which it was made, to say nothing of additional loading, on account of the new and novel principles involved in its construction, so that the building department of the city of Minneapolis refused to issue a permit for the first building except as a permit for an experimental building. Its original introduction in 1907 was due to the foresight of Mr. Charles A. Bovey, and his son Mr. Wm. Bovey, C. E., superintendent of the Washburn-Crosby Milling Co., to whom the matter was referred after consultation with the inventor and Mr. Fred Johnson.

In 1908 Mr. Turner designed the reinforced concrete work of the huge eight-story building for the John Deere Plow Co. at Omaha, Neb., the Leonard Construction Co. being the contractors and Turner furnished a bond in the sum of \$50,000 guaranteeing the strength of the construction. Mr. Turner subsequently designed a building for the Velie Motor Vehicle Co. for the same contractors, at Moline, Ill.

In the mean time the application for the patent had been pending for several years, and two interference proceedings were being fought out in the patent office with those with whom the original inventor had started in the reinforced concrete business, and for whom he had designed buildings of this type. These interference proceedings kept the basis patent tied up in the patent office for a period of seven years, when it was finally issued in September, 1911.

The non-appearance of the broad patent during this long period of time led to the assumption by many that Mr. Turner never would secure a patent and imitators and infringers sprang up on every side. Mr. Turner's old clients, the Leonard Construction Co. under the advice of their attorneys, were led to believe that by the purchase of an older patent, which had been tried commercially, and which had been issued to Orlando W. Norcross in 1901, for a construction entirely different, they could construct flat slab buildings after the manner of Turner and escape paying royalty to Turner and perhaps force Turner to pay tribute to them. This patent was discussed fully in the decision of the U. S. Patent Office Examiner, rendered Dec. 13, 1910, in the following words:

"The patents to Matrai, Speer and Seeley are all simply modifications of the suspended type of floor construction. Any resemblance found in these structures to the invention involved in this interference is believed to be accidental only, more apparent than real. The vital and essential features of the Turner construction are entirely lacking. The mode of operation and the results attained by Turner would be impossible with any of these structures alone or taken in combination with the structure disclosed in the patent to Norcross of the Folder No. 14.

"Referring particularly to the Norcross patent, it is a vital thing in securing the results attained by Turner to have the cantilever head arrangement at the top of the columns and the slab reinforcement extending therefrom in multiple directions through the slab, or, as defined in varying terms in the issue count, whereby a cantilever suspended arrangement results and the combined cantilever and flat plate action is secured.

"In Norcross the strips of wire netting are plainly intended as they are plainly shown and described, lines 21 and 32, page 2 of the specification, as mere supports at the bottom of the slab of concrete placed thereon. Clearly the reinforcement of Norcross is of the ordinary kind and is relied upon only as a tension element in the lower chord. As a cantilever reinforcement in the position shown at the bottom of the slab, it would be an entire failure."

Notwithstanding this decision, John L. Drum an employe of C. M. Leonard brought suit on the 9th of

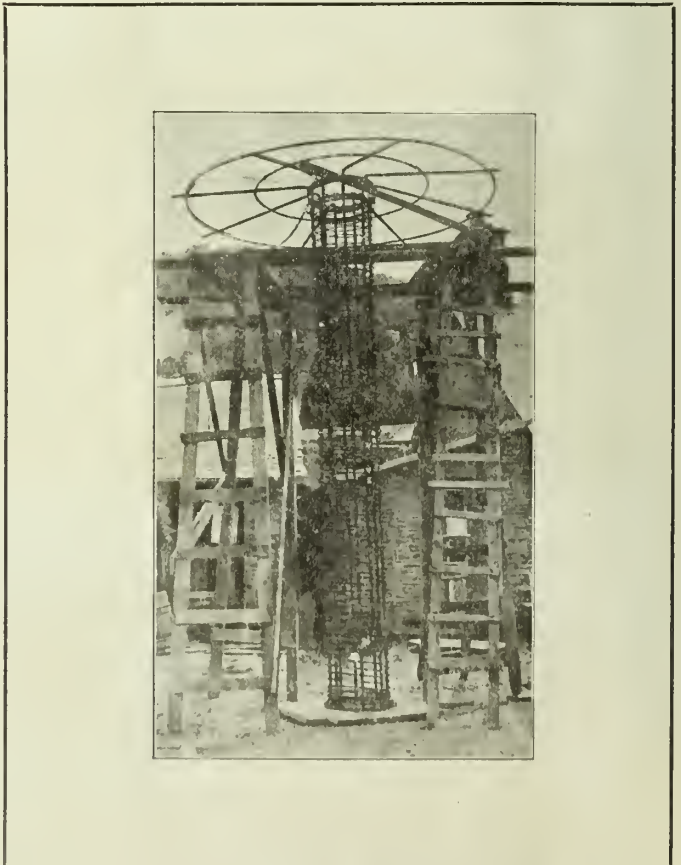
November, on this patent granted to cover an entirely different device, Equity Case No. 1083, while at the same time Turner was suing him on U. S. P. 1,003,384. The contention made by the plaintiff was that in the Norcross construction the metal, as the Primary Examiner stated, was in the lower layer throughout, and was to be relied upon only as a tension element in the lower chord, notwithstanding it was in the bottom, nevertheless, the concrete without reinforcement in the top of the slab could be depended on to take tension over the support, and the astounding assertion was made by witnesses for the plaintiff that this concrete, unreinforced over the support would resist the same bending moment as though steel were present to give it rigidity, a proposition in defiance of the law of conservation of energy, the theorem of least work and the principle of rigidities.

The decision just rendered by Judge Charles W. Willard sets at rest pretended claims of Mr. Turner's imitators, who hold the title by purchase for an inconsiderable sum, of the so-called Norcross patents. It sets at rest for all time any contention that the Turner construction is not original, and that the Turner patents and claims are not basic.

This sweeping decision of Judge Willard will unquestionably place all imitators of the well-known mushroom system in the position where they will be forced to give bonds against infringement, as Mr. Turner is rigidly prosecuting all infringers, having in his employ at the present time five of the best known and most able firms of patent attorneys in the United States.

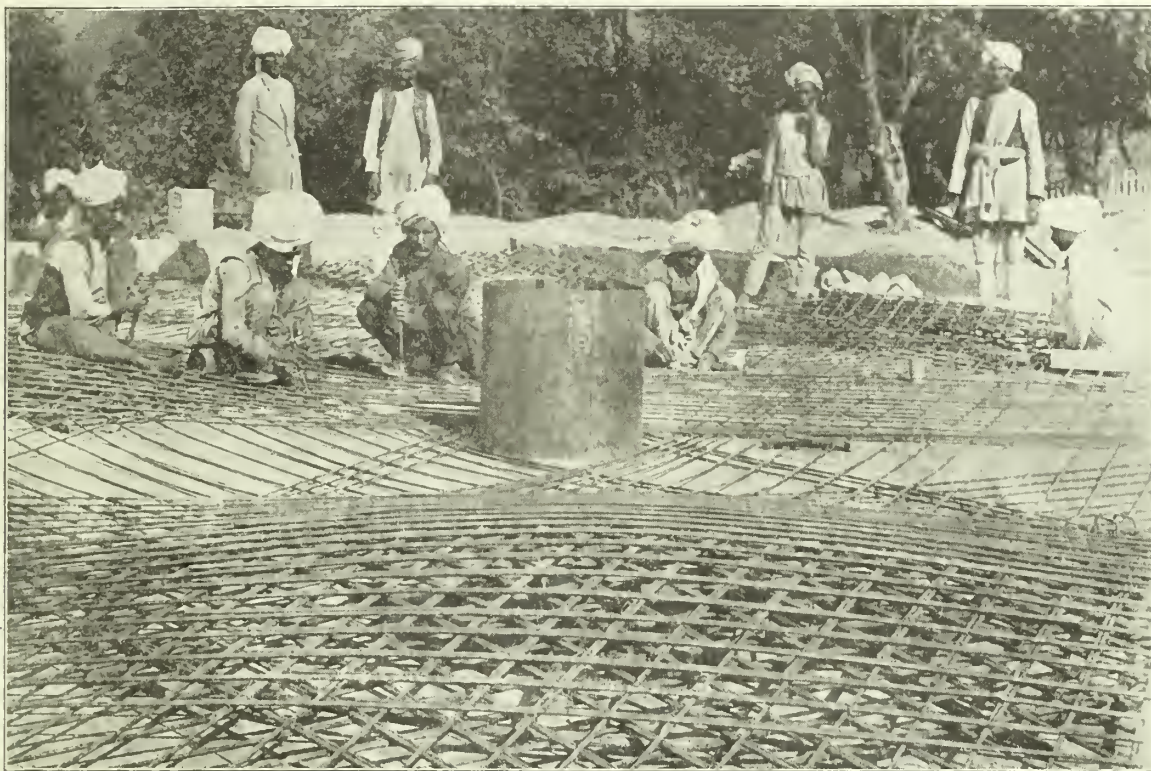
The case, for and on behalf of the plaintiff Drum, was conducted by A. C. Paul of Minneapolis, and Edward Rector of Chicago, and the hearing attended by both Leonard and Turner.

Minneapolitans can well take some local pride in that in their home town has originated this new and novel type of construction which has so completely revolutionized the construction of heavy buildings throughout this and other countries, a type of construction which all at present engaged in the reinforced concrete business have been forced to imitate in order to receive any consideration in the competitive field where the many advantages of the flat ceiling are appreciated and its wonderful economy well known.



Mushroom column reinforcement with spiral placed.

THE MUSHROOM SYSTEM IN INDIA



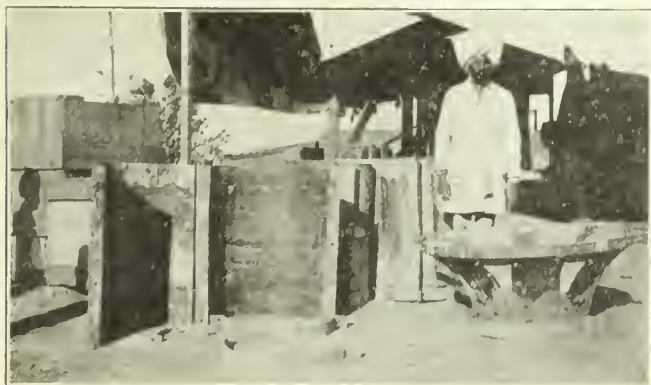
Mushroom reinforcement of the Dalhousie bakery building, Jullunder district, India, with the steel being placed by the native Hindu workmen.



Test load on the finished construction of Dalhousie bakery floor.

The British government have adopted the mushroom system for some of their buildings in India, and we illustrate herewith the Dalhousie bakery building, Jullunder district, Dalhousie, India. The figures and data are furnished by the courtesy of Colonel Nanton of the Royal Engineers and copied from the report of Mr. G. A. Leslie, Major, R. E., for Assistant Commanding Royal Engineer, Jullunder district.

The report of Major Leslie is a very complete one indeed, giving deflections and loading, age of concrete, and is in fact a very thorough investigation of the finished structure. It is too lengthy to be here reproduced, more particularly since the readers of the Improvement Bulletin are all thoroughly familiar with the system of construction, Minneapolis being its birthplace.



Column head forms used by the Hindu workmen.



Bamboo poles used for staging by the Hindu masons laying the brick work.

PERSONAL AND GENERAL NEWS

Doings of the Northwest this Week Boiled Down for Busy Readers

PERSONAL AND GENERAL.

The prosecution of the suit begun by the Ford Manufacturing Co., roofing manufacturers of Chicago, St. Paul and Vandalia, Ill., to recover over \$600,000 from the fire insurance companies on policies covering their Vandalia plant, destroyed by fire some time ago, has been on trial at Troy, Mo. The court took a recess over the Thanksgiving holidays until Dec. 4, when the insurance companies began to put in their defense.

United States Patent Roofing Co. has been organized at Chicago; \$30,000; manufacture and deal in all kinds of roofing. Wilson L. Kline, R. M. Carroll and Albert E. Icely.

A hotel building was cut in two to be moved four and one-half miles into the new town of Midway, N. D., by A. E. Humphreys, a contractor of McLaughlin, S. D. The building was 22x48, 1½-story. Mr. McLaughlin is building a 1½-story addition to the Bank of Midway; an A. O. U. W. hall; and a dwelling for Claude Lenox.

City Engineer Claussen of St. Paul is prosecuting two cases in the municipal court for violating the ordinance against blocking sidewalks.

Madison, Wis., new building code will be submitted to the council after New Year.

A notice in the Chippewa Falls Times, Dec. 11, announced that George A. Shannon and Fred B. Maxeiner, general contractors, dissolved partnership that day by mutual consent.

A Koehring street mixer loaned by the Iowa highway commission was used with success in Cerro Gordo county road building, says the Road Maker, of Des Moines. This mixer had been in use two seasons laying concrete roads on the campus of the Iowa state college at Ames. An average of five hundred square yards per day of seven-inch pavement is easily made with this outfit and twenty men.

Rock Products says Edwin H. Gebroad, of Grand Rapids, Mich., is promoting the organization of a sand, gravel and gypsum company for the development of some rich deposits near that city.

G. F. Weber studios, interior decoration, 920 Nicollet (Meyer Arcade) will remove to Handicraft Guild building, 89 S. 10th st.

The Iowa Clay Products Manufacturers' Association closed its thirty-third annual convention Friday at Des Moines with the election of B. C. Wheeler, Mason City, president; William Goodwin, Des Moines, vice president; George Schnurr, Kalo, treasurer; C. B. Pratt of Van Meter, re-elected secretary. It was in reality a "publicity convention," which the manufacturers just closed. The need of publicity as a means of promoting the manufacture of clay products was the keynote of every session. Next year's meeting place was not decided upon. Secretary Pratt said yesterday a mail vote will be taken soon. He believes it will be held either in Des Moines or Mason City.

Shellsburg, Iowa, has a new ordinance allowing fireproof buildings only in the business section.

Carl Anderson and Carl Stolp of Ellendale, N. D., have formed a partnership for general contracting.

ARCITECTS AND ENGINEERS.

The regular monthly meeting of the American Institute of Electrical Engineers was held at the Main Engineering building, at the University of Minnesota, Monday. A buffet luncheon was served at 7 p. m., the meeting following at 8 p. m. Chairman, W. T. Ryan, read an invitation from secretary, Preston S. Miller, of the International Electrical Congress, to join in its meetings to be held at San Francisco in Sept., 1915. The first paper of the evening was entitled "New Developments in Transmission Line Practice and Equipments" by R. A. Lundquist, consulting engineer, author of "Transmission Line Construction." This paper presented the state of the art down to the present time. The next paper was entitled "Line Disturbances and Protection from Electrical Storms" by Lincoln Nissley, Engineer, of the H. M. Byllesby Co. This paper presented a vast amount of new material for consideration and contained most valuable data secured during the storm at Hugo, Minn., on July 4th last. The meeting was attended by forty-eight members and visitors, among those present being Professors Shepardson, Springer, and Ryan, of the university and E. P. Burch, consulting engineer, also representatives of the Minneapolis General Electric Co., the city inspection department, the Consumers Power Co., the St. Paul Gas Light Co., the Twin City Street Railroad Co., and the Fire Underwriters' Association. Fred G. Dustin of the Northern Electrical Co., Minneapolis, is secretary of the organization.

Charles Alfred Hausler, announced this week that he

RIGHT TEMPERATURE IN THE HOME

WITH this perfect device you can determine exactly the inside temperature regardless of outdoor conditions or variations—whether 20 below or 40 above. All adjustments are made instantly from the thermostat which has its place on the wall in the living room.

The "MINNEAPOLIS" HEAT REGULATOR

With 8-day Clock Time Attachment

The clock attachment enables one to secure automatically and silently a change of temperature at any set hour. Model No. 60 (same as illustration) shows 8-day clock.

The "Minneapolis" is the "original" and "best" heat regulator—the standard for over 30 years.

Renders a service each year worth many times its cost. Saves many steps. Prevents extremes of temperature. Insures less fuel. Used with any heating plant. Sold and installed by heating trade under positive guarantee of satisfaction. Write for booklet.

MINNEAPOLIS HEAT 2768 4th Av. S., Minneapolis
REGULATOR CO. St. Paul Office, 140 Endicott Arcade



would hereafter be associated with Percy Dwight Bentley of La Crosse, and would be identified with the "progressives" in architectural styles. He has been for three years a member of the firm of Alban & Hausler. He has not selected his St. Paul office yet.

Wm. G. Purcell, of Purcell, Feick & Elmslie, architects, Minneapolis, who was a delegate to the A. I. A. meeting at New Orleans, has returned. He found it a very valuable meeting but he did not, as reported, offer any resolution. He says he was content to sit back and give attention.

A. F. Gauger of St. Paul, who was a delegate to the A. I. A. annual meeting at New Orleans has returned, via Texas, where his trip was interrupted and shortened by floods. He found a new south very different from that of thirty-seven years ago, when he first saw the country. Modern buildings and improvements are to be seen everywhere.

BRICK AND TILE NEWS

Farmers are slowly coming to realize the fact that the only way a low piece of land can be permanently drained is by the use of a suitable tile. Open ditches are an improvement over normal affairs, but they are only temporary at best. Tile once properly laid drains the land for all time. It costs a trifle more, but this is more than made up in the permanency of the improvement.

Lee & Gingery Co., of Sauk Centre's lumbermen, will do their full encouraging farmers to use tile for draining in the future. They recently unloaded a car of Mason City tile which they will sell to the farmers of this section.

Basin, (Wyoming) Brick & Tile Co. began business Dec. 8, capital stock, \$150,000, 500 shares preferred; D. L. Garr, H. H. Hine, Boies C. Hart, E. J. Sullivan, R. H. Ahrens, D. L. Garr president.

Hebron Brick Co, Hebron, N. D., will build a home for the single men employees; modern, to accommodate 100 men; contract to Dinnie Bros, Grand Forks.

A report from Minot states that Denbigh Brick Co. will resume operations in a short time, with new machinery.

WORTH KNOWING.

One of the most important fixtures an architect has to consider in the selection of his plumbing is the water closet. There is nothing that will cause more trouble and dissatisfaction than a closet that does not work properly.

Noiseless and efficient operating closets of various descriptions are on exhibition by the Central Supply Co. This firm is at present furnishing the closets for the new addition to the McKnight building, and have just secured the contract to supply those to be installed in the new Gate Way Comfort station. They are maintaining a spacious and luxurious display room, second to none west of New York City, exhibiting the latest and most modern sanitary fixtures for the accommodation of the architects, prospective builders and the plumbing trade.

CONSTRUCTION AND CONTRACT NEWS

OF SPECIAL VALUE TO ENGINEERS, CONTRACTORS, BUILDERS AND MANUFACTURERS

MINNEAPOLIS, MINN.

Office: 912 Lumber Exchange. Phones: N.W. Main 3902; T.S. 2194.
Please telephone news not later than Wednesday.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

Didas Cote, 1510 N. Knox av., 2-story frame dwl.....	2,000
Harry L. McCoig, 3808 Park av., 1-story plaster-veneer dwl.....	3,700
Wm. Eurich, 232 Lake of the Isles boul., 1½-story brick and hollow tile dwl with concrete garage and fuel room; M. Schumacher, builder.....	15,000
Calder & Peterson Co., 3505 2d av. S., 1-story plaster veneer dwl.....	3,000
C. W. Lunquist Co., 711-17 15th av. NE., 3-story brick furniture factory.....	22,000
Herman Anderson, 3308 21st av. S.....	2,000
Frank Baumeister, 4117 28th av. S., 1½-story frame dwl.....	1,000
Mabel Carlson, 3622-24 Longfellow av., 2-story plaster-veneer duplex.....	3,000
Thos. Peebles & Co., 4638 Park av., finish frame dwl.....	1,000
Albert E. and John S. Melin, 4404 Stevens av., 1½-story frame dwl.....	2,000
Horace Lowry, 1812 Logan av. S., 3-story brick and hollow tile residence, also 3-story brick and hollow tile garage and apartment connected to residence; M. Schumacher, builder.....	75,000
Arthur B. Hamburg, 3013-15 Franklin av., 2-story frame store and flat; John Rogge, builder.....	3,500
Blanche M. Parker, 4745 S. Bryant av., 1½-story plaster-veneer dwl.; J. W. Parker, builder.....	3,500
Blanche M. Parker, 4749 S. Bryant av., 1½-story plaster veneer dwl.; J. W. Parker, builder.....	3,500
Girard Investment Co., 1919 N. Penn. av., 1-story plaster-veneer dwl.....	1,200
Girard Investment Co., 2620 34th av. S., 1-story plaster-veneer dwl.....	1,000
W. J. Clark, 58 Groveland terrace, 2½-story brick and tile dwl.; N. Jensen, builder.....	9,800
Ole Johnson, 1920-22 Humboldt av., 2-story plaster-veneer flats (4).....	6,500
John Quinlan, 2600 Como av., 1½-story frame dwl.; E. D. Cairl, builder.....	1,500
W. T. Murphy, 2604 Como av., 1½-story frame dwl.; E. D. Cairl, builder.....	1,500
W. T. Murphy, 2608 Como av. SE., 1-story frame dwl.; E. D. Cairl, builder.....	1,600
R. M. Selb, 7 Barton av. SE., 2-story plaster-veneer flats (4).....	6,000
August Lindblad, 2220 26th av. S., 2-story plaster-veneer duplex; N. J. Mattison, builder.....	3,700
W. M. Lasley, 2939 N. Sheridan av., 1½-story plaster veneer dwl.; W. H. Smith, builder.....	1,000
L. W. Crawhall, 2710 Pleasant av., 2-story frame addition to dwl. and alterations.....	1,500
Georgia A. Lingenfelder, 3733 13th av. S., 1½-story frame dwl.; L. E. Stevens, builder.....	2,000
C. A. Fagerlund, 3443-45 19th av. S., 2-story plaster veneer duplex.....	2,650
Peter Peterson, 4324 Elliot av., 1½-story plaster veneer dwl.....	2,000
Irwin Goldstein, owner and builder, 4335 S. Lyndale av., 1½-story plaster veneer dwl.....	3,500
H. M. Thaxter, 3715 Harriet av., 2-story frame dwl.....	4,000
Christ Hilken, 2644 Washington st. NE., 1½-story frame dwl.....	1,000
Nels J. Hennoff, 3845 36th av. S., 1-story plaster veneer dwl.....	1,200
C. H. Heu De Bourck, 4025 Lyndale av. S., 2-story plaster veneer dwl.; H. Rakow, builder.....	4,000
C. H. Heu De Bourck, 4000 Garfield av., 1½-story plaster veneer dwl.; H. Rakow, builder.....	4,000
Peter Olberg, 2849 S. Irving av., 2-story plaster veneer duplex; H. E. Carver, builder.....	8,500
C. A. Johnson, Chicago, 2905-07 Elliot av., 2-story plaster veneer flats (4); John Peterson, builder.....	6,000
L. L. Chadwick, 4054 2d av. S., 1½-story frame dwl.....	2,000
Gluek Brewing Co., 24 Hennepin av., 3-story brick, steel and tile store and rooming house; R. J. Cheney & Co., builders.....	21,000
Leslie Paper Co., 321-26 7th av. N., 3-story brick and reinforced concrete warehouse; H. N. Leighton Co., builders.....	30,000
W. F. Andrews, 411-19 N. Washington av., 2-story brick and reinforced concrete warehouse; H. N. Leighton Co., builders.....	50,000
Cameron Transfer & Storage Co., 4th st. near 7th av., 1-story brick freight house.....	3,000
W. P. Hultgren, 4635 Pillsbury av., 1½-story frame dwl.....	1,800
Julia B. Clark, 4211 E. 32d st., 1-story frame dwl.....	1,200
Board of Education, Fremont av. N. near 17th av. N., repairs to North High school; J. E. Pilgram, builder.....	150,000
F. W. Bohlke, 2822 N. 4th st., 2-story frame addition and alterations to dwl.; Olaf Meadon, builder.....	1,200
Mauritz Anderson, 3801 Elliot av., 1-story frame dwl.....	2,000
Walter W. Springer, 4628 S. York av., 2-story plaster veneer dwl.....	3,600
Peter Ree, 3257 N. Morgan av., 1-story plaster veneer dwl.....	1,800
Anton J. Sandberg, 3642 28th av. S., 1-story frame dwl.....	1,600
N. C. Nielsen, 3525 13th av. S., 1½-story frame dwl.....	1,500
I. F. Cotton, 3728 29th av. S., 1½-story frame dwl.....	2,500
I. F. Cotton, 3705 28th av. S., 1-story frame dwl.....	2,000

Consideration of the number of large buildings which are about to be built, marking the close of the year shows that times are not at all bad in Minneapolis, at least in the building world. Bids are in and construction will begin soon on the Douglas Fiske block, Nicollet between 8th and 9th;

cost \$60,000. Plans are well under way, and bids will soon be taken on the large new modern theater on the Stewart property, 4th and Hennepin, and the hotel building adjoining, total investment being estimated at over a million, the cost of the theater alone being \$275,000. The plans are being drawn and material dealers are eagerly awaiting the building on the Loeb Arcade office building to replace the Hale block, 5th and Hennepin. Otto Brenner, Schmidt Brewing Co., St. Paul, who has secured control of the southwest corner of 6th and Hennepin, is expected to have plans out before long for at least an 8-story modern office and store building on the site. This was originally planned for a 12-story building. The library board will be ready in the course of the early months of the year 1914, to let contracts for three more branch libraries. The university will build an educational building and school of mines. Several handsome churches have been started with little more than foundation in at present, including the Fifth Christian Science building, University district. A handsome stone structure and the Hennepin Avenue Methodist Episcopal church will be one of the notable buildings of the city. Horace Lowry has just started a \$75,000 residence, and plans have been drawn for several others, to cost as much and more, including one to cost over \$100,000. The Soo road and First National Bank skyscraper has been started, the foundation on one side being in, and work on the basement; preparation for the vaults under way. The superstructure of the Athletic club is just being started. This list might be lengthened further, not to mention the \$500,000 3d av. viaduct; but enough has been stated to make the point that 1914 is bound to be one of the best years in the history of the city.

Buechner & Orth, St. Paul, who will be supervising architects of the new theater on the Stewart corner, 4th and Hennepin, for Ruben & Finkelstein, Grand Treater, by Geo. Benz & Son, St. Paul, owner, expect to begin taking figures soon after the first of the year. Plans are being completed by architects of Pittsburgh. The theater will be 102x157, 3-story, two double stores; cost \$250,000; seats for 2,100; all modern improvements; marble and terra cotta interior and exterior; no balconies.

A deal is in progress for enlarging Russell coffee house, 14 S. 4th, from 54 rooms to 125 under new ownership; Wm. Wiseman and Max and Alex Stern of Fargo, negotiating for the property; S. E. Betz, president Russell Coffee House Co.

R. J. Cheney & Co. have general contract for the hotel and store building to be erected at 24 Hennepin av. by the Gluek Brewing Co., cost \$24,000; C. A. Boehme, architect, Kasota block.

Geo. Dredge, 3309 Irving av. S., will build a 2-story plaster veneer residence at 4008 W. Minnehaha boulevard; 26x34, hot water heat, hardwood throughout, fireplace, open plumbing, tile bath and vestibule, wainscoting, beam ceiling, sun room, sleeping porch, gas and electric light, cost \$8,500; plans by Glenn L. Saxton, architect, Plymouth building; contract to Carlstad Bros., general contractors.

C. H. Heu De Bourck, 3334 Aldrich av. S., is building two modern dwellings at 4025, Lyndale S. and 4000 Garfield, 2-story, plaster veneer and 1½-story plaster veneer; concrete block foundations, hardwood floors and finish, hot water heat, tiling, laundry trays, sleeping porch, sun-room, mantles, cabinet work; cost \$4,000 each; H. Rakow, builder, 3428 2d av. S.

*Building Inspector Houghton went to the rescue of Building Inspector Van Ornum, St. Paul, Wednesday night, made a speech in favor of a testing plant, such as Minneapolis has and rescued the proposition from the discard, the item having been cut out by the city council. St. Paul city fathers gave Mr. Houghton a very cordial reception.

Permit was issued for Horace Lowry residence, 59x61, 3-story, brick and hollow tile, reinforced concrete floors, 3-story brick and hollow tile garage, 1st and 2d floors being reinforced concrete, first floor and roof wood, M. Schumacher, 39 Dell Place, contractor, Kees & Colburn, architects, Donaldson block.

Red River Lumber Co., 807 Hennepin, is building a model town, Westwood, Cal., in timber tract; all modern conveniences, municipal electric light and current for each house, street cleaning and disposal system organized. Fletcher L. Walker, treasurer, Westwood, Cal., in charge.

Two dwellings are being built by Blanche M. Parker, 4745-4749 S. Bryant, 24x26, 1½-story plaster veneer, hardwood floors and finish, electric light, hot water heat, tile bath, laundry tray, side board, book cases; cost \$3,500 each; J. W. Parker, builder, Plymouth building.

*Bids were in Dec. 19 on the Douglas Fiske building, Nicollet av. between 8th and 9th, east side, just south of Thomas store; 2-story, brick, steel, reinforced concrete, two stores, cost \$50,000; plans by Victor F. V. de Brauwere, architect, Plymouth building.

Arthur B. Hamburg, 60 Highland av. is building a store and flat at 3013 Franklin av. E., concrete block foundation, 24x44, frame, plate glass front, hardwood floors and finish, plumbing, gas; cost \$3,500; John Rogge, builder, 4720 Harriet av.

*Twin City Tile & Marble Co., 312-14 S. 7th st., have received contract for Walker-Burton block, 1st av. N. and 7th st., and have just completed a \$20,000 tile contract on the Mayo hospital, Rochester, which occupied six months time.

A plaster veneer bungalow will be built by Calder & Peterson Co., 3022 Fremont av. N., at 3505 2d av. S., 24x36, concrete block foundation, hardwood floors and trim, hot water heat, tile bath, laundry tray, electric light, day labor.

*Permit was issued for Leslie Paper Co., warehouse, 324 7th av. N.; 40x150, 3-story, brick and reinforced concrete, \$30,000; plans by Bertrand & Chamberlin, architects, Northwestern Bank building, contract to Leighton Co.

A duplex will be built by Peter Oberg at 2849 S. Irving, plaster veneer, 37x39, modern throughout, hot water heat, wiring, tiling; cost \$8,500; H. E. Carver, builder; Perry Crosier, architect, 4010 Nicollet av.

C. A. Johnson, Chicago, will build a flat at 2605-07 Elliott av., 39x52, concrete block foundation, hardwood throughout, hot water heat, electric light and bells, laundry, porches; cost \$6,000; John Peterson, builder.

Madsen Bros.' new apartment building, Spruce Arms, corner of Spruce place and 15th st., is being equipped throughout with the Monarch metal weather strips by Oscar F. Symons & Co., 838 Plymouth building.

Exterior of new Saxe theater adjoining Miles, 7th st. will be light colored ornate terra cotta; interior ornamental plaster, excavating to begin Monday, Chapman & Magney, architects, Essex building.

*A 1-story freight warehouse is being built by Cameron Transfer & Storage Co., 756 N. 4th st., on 4th st. between 7th and 9th avs. N., 163x36, stone foundation, flat roof, cost \$3,000; day labor.

Drummons Hall Settlement House, 15th and 2d st. NE., will be enlarged by Plymouth Congregational church; large house on site probably erected later, similar to Pillsbury Settlement.

Hewitt & Brown, architects, of the McKnight building are making plans for an observation tower above the 12th story of the building; 3-story in height, equipped with telescope.

A brick furniture factory will be built by the C. W. Lundquist Co., 1604 N. 6th at 711 15th av. NE., 80x128, 3-story; cost \$22,000; concrete and stone foundation day labor.

*Permit was issued for the W. F. & H. S. Andrews warehouse, 4th av. N. and Washington, 100x135, brick and reinforced concrete; \$50,000; contract to Leighton Co.

Reported that Otto Bremer, treasurer, Schmidt Brewing Co., St. Paul, who controls southwest corner 6th and Hennepin, is planning an arcade store and office building.

United States government will probably dredge the new harbor between Washington av. bridge and Franklin if the city buys dock property and builds sea walls.

Mable Carlson will build a duplex at 3022 Longfellow, 24x42, concrete foundation, plaster veneer, plumbing, gas, hardwood trim, laundry trays, \$3,000 day labor.

*Walter W. Soring, 4549 Washburn av. S., is building a dwelling at 4628 S. York; 25x28, plaster veneer, modern, hot water heat, tile, cost \$3,600; day labor.

A duplex is being built by C. A. Fagerlund, 1910 E. 35th, at 3443 19th av. S., 2-story plaster veneer, 24x42, hardwood trim, plumbing, gas, day labor, \$2,650.

Use of garbage crematory power station for electric street lights, is being investigated by City Engineer Cappelen, and light bids will be deferred.

*Anders Sorensen will build a plaster veneer duplex, hardwood trim, plumbing, gas, at 2606 37th av. S., 22x28, concrete block foundation, \$2,500.

*Heating and plumbing contract on Truman Clark residence let to C. J. Maurud, Mather & Burner, architects, McKnight building.

*Calhoun Commercial Club heating contract let to Jones & Sawyer, 3007 Hennepin; F. W. Kenny, architect, Plymouth building.

Bids received till Dec. 29, 12 noon, for band stand and addition, Lake Harriet pavilion; J. A. Ridgway, park board, city hall.

*State Sanatorium, Minn.—Bids received till 2 p. m., Jan. 2 for mechanical equipment and other details, State Sanatorium, State Sanatorium, Minn.; C. L. Pillsbury, consulting engineer; official advertisement in Improvement Bulletin this week.

ST. PAUL, MINN.

404 Scandinavian American Bank Bldg. Phone: N.W. Cedar 1683.
Mail or telephone news not later than Wednesday.

BUILDING PERMITS.

J. Gordon, 188 N. Snelling, 1½-story frame dwl., Argyle near Oxford; J. Gordon, builder.....	3,500
J. L. Gordon, builder, 188 N. Snelling av., 1½-story frame dwl., Argyle near Oxford.....	3,000
Frank Stibetz, 585 Front, 1½-story frame dwl., Front near Dale	3,000
D. O. Gurgenson, Park av., 2-story frame and stone flats, Park av. near Como; Wm. T. McKay, builder.....	5,000
Mary Husby, 1384 Raymond, 2-story frame flats (4), Raymond near Carter; O. J. Husby, builder.....	5,000
Mrs. S. J. Scavolt, Cambridge st., 1½-story frame dwl., Cambridge near Osceola; C. E. Lyons, builder.....	3,200
James R. Shaw, 89 S. Cleveland, 1½-story frame dwl., Grand near Hamline; James R. Shaw, builder.....	2,500
Paul Martin, Fairmont, 1½-story frame dwl., Fairmont near Oxford; Paul Martin, builder.....	3,200
John Brigham, Selby, 1-story frame dwl., Selby near Finn; H. H. Wilcher, builder.....	2,500
Raak Bros., builders, 1-story frame dwl., Ottawa near Wyoming and Winona.....	2,000
A. Silver, 547 Ashland, alterations, 583 Holly near Kent; A. J. Carlson, builder.....	12,000
Alfred Johnson, 399 E. 8th st., 2-story frame dwl., Burr near Lawson, Alfred Johnson, builder.....	4,000
Webb Publishing Co., elevator, 10th st. near Cedar; Lee & Hoff Mfg. Co., builders.....	1,150
Erick Strandlof, builder, 1263 Seminary, 1½-story frame dwl., Wesley near Aldine.....	2,400
Erick Strandlof, builder, 1½-story frame dwl., Wesley near Aldine	2,400
Gust M. Lindgren, 724 Como av., 1½-story frame dwl., Como av. near St. Albans; Gust M. Lindgren, builder....	2,800
John F. Finney, builder, 757 Aldine, 1½-story frame dwl., Minnehaha near Aldine.....	2,500
Henry Kahlman, builder, 586 Iglehart, 2-story frame flats, Cleveland near Goodrich.....	5,000
Miss Mary Nelson, 972 Payne av., Margaret near Atlantic; J. A. Johnson, builder.....	1,800
J. J. Martin, 438 E. 7th st., 1-story brick store, Maria near 3d; Wystrom, builder.....	4,000
A. B. Anderson, 19 N. Carroll, 2-story frame dwl., Cretin near Carroll; J. A. Stenoy, builder.....	4,000
Wm. Constans, alterations, 240 E. 7th st.; J. M. Carlson, builder	1,100
Emma La Rue, 90 Winifred, 1½-story frame dwl., Congress near Wabasha; O. R. La Rue, builder.....	2,500
C. O. Sandstrom, 1520 Albany, 2-story frame store and dwl., Albany near Aurora; C. O. Sandstrom, builder.....	1,500
Midway Warehouse Co., builders, 1-story frame and iron shed, Wabasha near Pittsburgh.....	1,700
City and County Hospital, 3-story brick hospital; W. A. Cameron & Co., builders.....	110,000
D. W. Ruff, 530 Globe bldg., 1½-story frame dwl., Sherburne near Milton; D. W. Ruff, builder.....	3,000
F. E. Gladen, builder, 1739 Reaney, 1-story frame dwl.....	1,000

B. Terrell Hoyt, landscape architect, Hoyt and Hamline avs., recently completed landscape plans and complete planting for the estate of Charles O. Gilfillan, nearly 10,000 acres, in southern Minnesota. Mr. Hoyt is planting trees, shrubs and flowers for John L. Kennedy's estate, Omaha, seven acres. He used dynamite to blast large holes in heavy clay and to loosen ground for trees, the first time dynamite had been thus used in Omaha. He has laid out and planted grounds for Mrs. Charles O'falt of Omaha; has also laid out a number of St. Paul homes, among them: Mr. Shields, Fred Crosby, Dr. Beebe and John Leuthold all of Summit av. He has made a number of Minneapolis plantings, the last for James Burner, 5125 Lyndale av. S., completed Dec. 6, the latest he has ever made any plantings in Minnesota. Mr. Hoyt has drawn landscape plans for new homes in Rochester, Benson and other points in Minnesota.

Buechner & Orth, Shubert building, St. Paul, will be supervising architects for the theater in Minneapolis, to be built by Geo. and Herman Benz of this city on Hennepin near the corner of 4th, at the south end of the Stewart corner, recently secured by the Messrs. Benz as a site for a theater and a hotel; more definite announcement regarding hotel later. Plans for a theater expected to be ready for figures soon after the first of the year. Architects for theater are John Reed Fugard, and John Ebersson, Chicago, Ill.

Sub-contracts on the city and county hospital were let by the general contractor, W. A. Cameron & Co., Ryan Annex, as follows: brick, Chaska Brick Co.; salt glazed brick, Johnson, Jackson & Corning, Ryan; marble and tile work, Breen Stone Co.; painting, Aug. Olson, mill work, St. Croix Manufacturing Co., Stillwater; galvanized iron work, Thomas Finn; iron, St. Paul Foundry Co.; hardware, Daily-Fraser Hardware Co., 417 Cedar; 3-story brick \$110,000.

Harry Segelbaum, 116 Smith, will build 4-family flat, five rooms each on Grand and Saratoga; plans by H. E. Erickson, Union block, brick veneer, stone foundation tile baths, and vestibules, 38x54, screen porches, one hot water plant, oak and birch interior finish, built-in refrigerators, sideboards, book cases, open arch ways, leaded glass mirrors, French doors, laundry trays, plans out next week, owner will take figures.

Toltz Engineering Co., Pioneer building, has prepared plans

for a motion picture theater, Rice and Front, for W. W. McGee; brick, 2-story, fireproof, enamel brick and terra cotta front, electric light, iron and glass canopy, steam heat, concrete floor, tile lobby, ornamental plastering, stone foundation, composition roof; plans out in two weeks; owner will take figures.

A. M. Garlough, architect Rosen building, has prepared plans for a residence, Portland and Snelling, for H. M. Elmer, the general contractor; brick veneer and stucco, 2-story, 28x34, stone foundation, hot water heat, tile bath and vestibule, leaded glass, side board, book cases, tile mantel, sleeping porch, hardwood throughout, foundation in, owner will let all work.

The apartment block to be built by the Aarrack Investment Co., 220 Globe building, will be all modern, faced brick, five apartments, 5-rooms and bath, glass sun-parlors, 5 separate hot water heating plants, shingle roof; Aug. Swanson, general contractor; Richmond apartments, two buildings, 8-flats each sold by Peterson, 220 Globe building, to W. H. Kurth, St. Paul.

A. B. Anderson 19 N. Carroll, is building a 2-story frame dwelling on Cretin between Carroll and Arundel; 26x30, concrete foundation, hot water heat, hardwood floors and trim, plumbing, wiring, tiling, mill work, laundry trays, sleeping porch and sun-room, mantel; cost \$4,000; J. O. Stenvig, builder, 2514 6th av. N., Minneapolis.

Figures are still being taken on the Grossman 6-flat, by the architect, H. A. Miller, Pittsburgh building; 3-story brick, steam heat, vacuum cleaner, tiling, hardwood throughout, sleeping porches, decorations, gas and electric fixtures, all in general contract, foundation in; Holly between Kent and Dale.

Alfred H. Wheeler, architect, Globe building, has prepared plans for a duplex, at Burr and Lawson; 26x44, frame, stone foundation, hardwood finish, laundry trays, hot water heat, wiring, electric bells, leaded glass, mill work, cost \$5,200; A. E. Johnson owner, plans ready next week, foundation in.

Alfred Johnson, 399 E. 8th, is building a 2-story frame dwelling, on Burr, between Lawson and Cook, 26x44, concrete foundation, hot water heat, hardwood throughout, tile bath, sleeping porch, sun-room mantel, mill work, leaded glass, electric light; cost \$4,000; owner will build.

Mrs. S. J. Scabold is building a 1½-story frame dwelling, on Cambridge between Osceola and Lincoln; 28x26, concrete foundation, hardwood throughout, hot water heat, modern plumbing, wiring, mantel, mill work; cost \$3,200. C. E. Lyons, builder, 5014 1st av. S., Minneapolis.

Work will begin soon on razing building at 4th and Minnesota on site of 3-story, fireproof business block for John R. Mitchell, president Capital National Bank; foundation for six buildings, cost \$100,000; plans by C. H. Johnston, Capital National Bank building.

Permanent exhibit being arranged by St. Paul Builders' Exchange has advanced further toward completion with increasing indication of very popular and successful results; Secretary Williams has some ingenious devices for multum-in-parvo exhibits.

A 1½-story frame dwelling is being built by Paul Martin on Fairmount between Oxford and Lexington, 24x26, hardwood floors and trim, modern plumbing, hot water heat, wiring tile bath, \$3,200; Eugene Schmidt Co., builders, 1642 University.

A flat will be built by Henry Kahlman, 586 Iglehart, on Cleveland between Goodrich and Grand; 4-apartments, 30x56, hardwood floors and trim, hot water heat, tile bath, and vestibules, wiring, porches, laundry, \$5,000; owner will build.

Foundation contract awarded to M. Mathieson, for duplex, 14th and Jackson, to be built by Hyman J. Butwinneck, 159 Robertson, electric light, hot water heat, laundry, hardwood trim; cost \$4,000; plans by H. A. Miller, Pittsburgh building.

A 1½-story frame dwelling is being built by D. W. Ruff, 530 Globe building, 24x26, concrete foundation, hardwood trim, floors, hot water heat, plumbing, wiring, tiling, leaded glass, on Sherburne between Milton and Chatsworth; \$3,000.

Mary Husby, 1384 Raymond, is building a 4-flat on Raymond between Carter and Doswell; 40x52, 2-story, frame, hot water heat, plumbing, wiring, laundry trays, enclosed porches, composition roof, O. J. Husby, builder, 1384 Raymond.

A 1½-story dwelling is being built by Gust M. Lindgren, 724 Como, on Como, between St. Albans and Grotto; 25x26, concrete foundation, hardwood floors and finish, hot water heat, plumbing, wiring, \$2,800; owner will build.

D. F. Jurgenson, 6 Oakley is building a flat on Park av., between Como and Winter, 2-story frame and stucco, 38x44, hot water heat, modern, enclosed porches; cost \$5,000; W. F. McKay, 1542 Rondo, builder.

Minnesota Mining & Manufacturing Co. bought adjoining land from L. P. Ordway, at Forest and Ross, Omaha track-age, and plans addition soon; E. B. Ober, president, John Cable, assistant secretary.

Emma LaRue, 90 W. Winnifred, is building a 1½-story

frame dwelling, 28x26, hardwood floors and finish, plumbing, gas; cost \$2,500; on Congress between Wabasha and Starkey, O. R. LaRue, builder.

Erick Strandlof, 1263 Seminary, is building a 1½-story frame dwelling, 22x28, on Wesley, near Aldine, hardwood trim, plumbing, gas, \$2,400; also another dwelling, same specifications and location.

John Bingham is building a frame bungalow, 26x38, 1-story, hardwood trim, plumbing, gas, on Selby between Finn and Cleveland, \$2,500, H. H. Wilcken, 319 Andrus building, Minneapolis, contractor.

Two dwellings are being built by J. Gordon, 188 N. Snelling, on Argyle between Oxford and Chatsworth, 24x31, 1½-story, frame, modern hot water heat, mantels, \$3,500 and \$3,000; owner is building.

Frank Stibetz, 585 Front, is building a 1½-story frame dwelling on Front between Dale and Mackubin, 16x42, hot water heat, hardwood floors and trim, plumbing, wiring, \$3,000; owner is building.

A 1-story brick store is being built on Maria between 3d and 4th, 25x50, plate glass front, hardwood finish, modern, hot water heat, \$4,000; A. A. Nystrom, builder, 224 W. 5th.

A 1½-story frame dwelling is being built by John M. Finney, 737 Aldine on Minnehaha between Aldine and Wheeler, 24x26, hardwood trim, plumbing, gas, \$2,500; owner will build.

H. A. Miller, architect, Pittsburgh building, will have plans out first of year for the modern cottage to be built by Miss Emma Wagner, 229 Fuller, on Carroll near Mackubin.

A 2-story brick exchange for N. W. Telephone Co., Goff & Dearborn, will be completed April 1, and include 26 switch boards, fireproof, rest room, lunch room, cost \$18,000.

Alterations in the 3-story brick and stone flats, 583 Holly, are being made by A. J. Carlson, contractor, 553 Jackson building, for A. Silver, 547 Ashland; cost \$12,000.

James R. Shaw, 89 S. Cleveland is building a 1½-story frame dwelling, 24x24, hardwood trim, plumbing, gas, \$2,500; Grand between Hamline and Albert.

O. G. Rognan, 9 Detroit building, is preparing plans for addition to St. Paul Hospital Association hospital, Robert and University; \$7,000; brick, 48x32.

Norwegian Lutheran church, Park and University, will be completed in March, plastering soon; cost \$50,000. Rev. R. F. Reque, pastor, 495 Park av.

MILWAUKEE, WIS.

Office: Hathaway Building. Telephone: Main 1827.
Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

Felix Skupski, Lincoln av., between 10th and Windlake av., store	5,800
Chas. Tribel, Greenfield av., between 29th and 30th, flat...	4,000
Lorenz Miller, 1045 26th av., flat.....	3,300
Albert H. Rheins, southeast corner 7th and Walnut st., addition	1,500
Theo. Hollingagel, 946 3d st., garage and repair shop.....	2,400
Henry Ranthum, 1178 29th st., flat.....	4,000
L. H. Giesinger, 1144 29th st., flat.....	4,500
F. R. Foster, 580 31st st., addition.....	1,200
Harry Silbar, 910 St. Paul av., alterations and additions...	1,200
N. J. Moehn, 2806 Wright st., flat.....	4,000
R. Bruce Douglas, 3d av. between Montana and Dakota, cottage	2,100
T. Otjen, Pryor av. near Clement, flat.....	2,500
Barney J. Weber, Bishop av. between Pryor and Iron, dwl.	2,550
Wm. Hacker, 1373 8th av., cottage.....	1,000
August Rehhan, American av. north of Oklahoma, cottage.	1,400
Herman Langschwager, 1445 4th st., flat.....	3,500
A. H. Straus, 593 Downer av., store building.....	4,000
L. H. Geininger, 1144 29th st., flat.....	4,500
F. R. Foster, 580 31st st., addition.....	1,200
Harry Silbar, 910 St. Paul av., alterations and addition...	1,200
N. J. Moehn, 2806 Wright st., flat.....	4,000
R. Bruce Douglas, 3d av. near Montana, cottage.....	2,100

The McGeogh Real Estate Co. is planning to erect eight frame dwellings during the winter in West Allis. Conrad Bros., 5524 National av., contemplate a brick store building, 2-story and basement, 120x120x140, in spring. Two new buildings for the Allis-Chalmers Manufacturing Co. will be 50x350 and 100x350. The American Bridge Co., Milwaukee, has the structural steel and Meredith Bros., Milwaukee, the mason work. Jacob Hasenfus is erecting a duplex flat building at National and 61st avs., to cost \$6,000. Geo. Goesser, Milwaukee, will erect a bungalow on a site recently purchased in Conrad Garden. W. H. Shenner & Co. will build 15 dwellings in West Allis in spring on 64th and 65th avs.; cost from \$2,000 to \$2,500.

The Badger Architects, 916 Walnut st., have awarded the general contract for the construction of a 1-story, 30x46, brick store building for Max Waldorf on 32d av. to B. Mendelsen; cost \$2,300; the same architects have let the general contract for remodeling the manufacturing building at Virginia and Reed sts., to C. J. Gollin; the contracts for constructing a 3-story store, office and flat building for Albert A. Rheins, at 7th and Walnut sts., plans for which were prepared by the

same architects, have been let as follows: mason, Frank Tusch; plumbing, Dave Stearn.

Architects Siebert & Bruecker, 557 12th st., are preparing plans for a 1-story, 45x65, structure to be used as an undertaker's morgue and garage. Plans provide for a reinforced concrete foundation, brick walls, and fireproof windows, costing \$3,500; to be erected at 44th st. and Lisbon av.; the same architects will be ready for bids in a few days for the erection of frame and concrete bungalow on Green Bay av.; it will be 24x38; bids for carpenter, mason, concrete block, plaster, sheet metal, plumbing, painting and glass; cost \$2,000.

Architect Martin Tullgren & Sons, 133 2d st. will be ready with plans for bids about Jan. 1 for an apartment building to be erected at 32d st. and Grand av., for Oscar Brachman. It will be 55x130, brick and stone fireproof construction, containing 12 apartments and cost \$55,000. The same architects are also planning another apartment building of similar construction for the same owner for erection at Prospect av. and Webster place. Bids will be taken about the same time.

Martin Tullgren & Sons, 133 2d st. has awarded contracts for erecting a store building for A. Strauss, on Downer av., near Bellevue place; carpenter R. A. Owen; mason and concrete, Riesen & Wilke; plaster W. Gregory; iron work, Hackendahl & Schmidt; plumbing, heating and ventilating, Thompson & Harriman; sheet metal, Thompson; roofing, South Side Roofing Co. The structure will contain two stores, 30x67. Freming Bros. have the excavating; cost \$10,000.

Improvements are contemplated to the store building now occupied by the Gross Hardware Co., Grand av., between W. Water and 2d sts. The building is reported to have been leased by the A. Spiegel Drug Co., which will occupy the building as soon as the Gross Co. removed into the former quarters of the Riverside Printing Co., on 3d st., now being remodeled. It is said that the lease requires expending \$40,000 on the store on Grand av.

Fons & Co., 422 Mitchell st., have awarded the general contract for the erection of three cottages in the town of Lake, to Wacław Wieczorek; excavating, Frank Brzezinski; mason, Frank Lezala; concrete block, Berthelet Sewer Pipe Co.; sheet metal, John Tadych; painting and glass, Martin Maciejewski; lumber and mill work, Wisconsin Lumber & Supply Co., in one; and South Side Lumber Co. and G. A. Butter in the other two.

Architects Herbst & Hufschmidt, 301 Juneau Theater building, have awarded the contracts for building for the S. G. & S. Realty Co.; to be 2-story, brick, concrete and steel; 65x85; carpenter, C. Grellinger; mason and concrete, State Concrete & Block Co.; tile, Wisconsin Mantle & Tile Co.; sheet metal, Klippel & Arzberger; iron and steel, J. Skobis & Co.; plumbing, John L. Hahn; roofing, South Side Roofing Co.

Architect Edward Kozick, Alhambra building, has let the contracts on the residence of H. W. Schwab; carpenter, Christopher Junghaus; mason and concrete, Reinhold Jeske; plaster, George Kissner; sheet metal, John Graf & Co.; iron work, Jos. Skobis Co.; plumbing, Louis Schmitt; heating, Mueller Heating Co.; electrical work, Callen & Poehlmann; painting, Paul Wagner & Co.

Architect Clare C. Hosmer, Wells building, has awarded the contracts on the residence for W. H. Brandt, on Stowell av., south of Mineral road. It will be frame and stucco; carpenter, J. F. Fisher; mason and concrete, Kehrein Bros.; plaster, Chas. E. Bartz; sheet metal, Roden & Raschka; plumbing, O. H. Dittmer; heating, Mueller Furnace Co.; electrical work, Callen & Poehlmann; painting, John Meier.

Architect Stanley F. Kadow, 988 Kinnickinnic av., has awarded additional contracts for the erection of a 2-story duplex flat for Peter Meisenheimer on 24th av. To be brick, 29x58, and cost \$7,000; carpenter, P. Gargen; mason and concrete, Northern Construction Co.; plaster, J. Bartz; plumbing, Herman Baucr; sheet metal and asbestos roofing, Nic. Stollenwerk; painting, O. Gargen.

The city authorities are discussing the advisability of erecting a municipal garage and repair shop for the automobiles now owned by the city. A site under the 16th st. viaduct is being considered; it is planned to provide in the 1914 budget an appropriation for this work in amount of \$20,000. J. A. Mesiroff is city engineer; F. G. Simmons, commissioner of public works.

Architects Martin Tullgren & Sons, 133 2d st. have awarded the contracts for remodeling the former Wisconsin College of Music conservatory on Grand av., between 8th and 9th sts., into an apartment and stores. Carpenter, R. A. Owen; mason Riesen & Wilke; steel work, Milwaukee Structural Steel Co.; painting, J. B. Rice; copper front, Kawneer Manufacturing Co. Cost \$12,000.

Fons & Co., 422 Mitchell st., have awarded the general contract for the erection of 2 duplex flat buildings, at 1170 and 1172 Greenbush st., to Leo. Siojowski; concrete block, Berthelet Sewer Pipe Co.; sheet metal and hardware, John Tady-

ych; plumbing, R. M. Buddinger; painting, Martin Maciejewski; lumber, South Side Lumber Co.; interior finish, G. A. Butter.

Architects Van Ryn & De Gelleke, Caswell block, have awarded the general contract for the fireproof, brick and stone, addition to the Milwaukee Public Library, Grand av., 8th and 9th sts., to F. G. Riesen; plumbing, Chas. Fox; heating and ventilating, H. Sohns; electrical George Rohn; mezzanine floor, stair and marble work, Art Metal Construction Co.

Fons & Co., 422 Mitchell st., have awarded the general contract for the erection of three duplex flats at 44, 46 and 50 Wright st., to Michael Kojnowski; mason, Frank Podlaszewski; excavating, Jacob Posanski; concrete block, Berthelet Sewer Pipe Co.; lumber, Schroeder Lumber Co.; mill work, Interior Woodwork Co.

Architects Christiansen & Kemnitz, 87 Howell av., have plans prepared for a frame duplex flat, 26x45; costing \$5,000, for Mr. Sanderson at 26th and Madison avs. Bids received after Dec. 20 for carpenter, mason, concrete, cut stone, plaster, sheet metal, iron, plumbing, hot water heating, electrical, painting and glass.

Architects Robert Messmer & Bro., Majestic building, have awarded contracts for erecting the business block for V. Montevld & Son. Carpenter, J. Gollin; mason, Emil Grethner; sheet metal, Bodden & Raschka; iron work, F. Wagner; plumbing, D. Polachek; painting and glass, Wm. Metzka; cost \$14,000.

Architect Chas. H. Tharinger, 2324 State st., took bids up to Thursday, Dec. 18, for the construction of a solid brick, 106x45 feet, saloon, bowling alley and apartment building; bids for tile, iron, plumbing, heating, electrical, painting and glass; to be erected for Philip Vally on Junction av., and cost \$30,000.

Architect L. M. Gurda, 920 2d av. will receive bids for all work except mason and iron on a store building for Felix Skupski, 549 Mitchell st., to be 48x82, 1-story, with foundation capable to carry additional stories; mason awarded Anton Mikolajewski and iron to Jos. Skobis & Co.; cost \$10,000.

Architects Siebert & Bruecker, 557 12th st., have awarded the contracts on the office building of Dr. Wm. Gillespie, Grove st. and National av.; mason Levi Bros.; plaster Paul G. Lehwald; iron work, Bayley Structural Iron Co.; plumbing, Michael Mueller; electrical work, Krech-Garwood Co.

Architect Stanley F. Kadow, 988 Kinnickinnic av., is preparing plans and will be ready for bids after the first of the new year for erecting a store and flat building for H. Jensen, at Delaware and Northwestern avs. It will be frame, with concrete foundation, 24x50, and cost \$5,000.

Architect F. W. Andree, Cawker building, has awarded the general contract for the erection of a residence for Wm. J. Monson, 8th st., near Locust st., to Mike G. Winter, who will do all work except plumbing, heating and ventilating which was let to Naps & Loesch. Cost \$4,500.

Architect C. L. Lesser, 6225 Greenfield av., will receive bids next week for the construction of a storage warehouse, 2-story, 130x250 feet, of frame, brick and concrete construction. It will be erected at Wright and Bolton streets for the Shadboldt & Boyd Iron Co.

The Milwaukee Wrecking Co. has the contract to raze the former Bodden Packing Co., plant; it is a 4-story structure, at Muskego av., and the Menomonee river. The site is said to be contemplated for a large manufacturing building.

Contract noted in last issue as structural steel to Jos. T. Tyerson & Co., Chicago, for new Mt. Sinai hospital, at 12th and Cedar sts., E. Brielmaier & Sons, architects, was an error; they were awarded the reinforcing steel contract.

Architect Edward Kozick, Alhambra building, has awarded contracts for the erection of a bungalow for H. Hayssen, at Sheboygan, Wis. The carpenter is Mr. Stuhnenrauch and mason, Wm. Guenther; cost \$5,000.

Architect Stanley F. Kadow, 988 Kinnickinnic av., will take bids about Jan. 15, for a two store and four flat building, of brick construction, 46x60, for Michael Wargin, at Lincoln and American avs.; costing \$18,000.

The Milwaukee Printers' Roller Co., Wallace P. Allen, secretary, has purchased a factory site on Greenbush st., near Florida st., 50x140, and will erect a 2-story and basement fireproof plant in spring.

Chas. Guetzkow Co., Majestic building, have the contract to rebuild the entrance of St. Charles hotel; marble and plate glass front, revolving doors, lowering entrances to street level; cost \$3,500.

Architect Walter F. Neumann is letting contracts for the construction of a moving picture theater on Chestnut st., between 6th and 7th sts.; to be 33x150, of brick and terra cotta; costing \$10,000.

The Bradley & Metcalf Co. is preparing to begin work early in spring on a new shoe manufacturing plant at Erie st. and

Broadway. To be of reinforced concrete and brick construction, 80x100.

The Badger Architects, 916 Walnut st., have revised plans and will take bids shortly for erecting a store and flat building for J. Rosenburgh; to be 26x48; cost \$5,500.

Wm. Zunker, 3023 Mt. Vernon av., is general contractor for a frame duplex flat for Max Stanim, 3628 Sycamore st., to be erected at the foot of 32d st., costing \$4,500.

Work on the new St. Thomas Aquinas Catholic church, pastoral residence and nuns' convent has been started at 36th and Brown sts.; to cost \$100,000.

Theo. Otjen, 1145 Kinnickinnic av., has given the general contract for a frame residence, 24x32, to Herman F. Krause, Jr., 870 Superior st., costing \$2,500.

Barney G. Weber, 799 10th av., is building a frame residence on Bishop av., near Pryor, to be 2-story, 24x26, and cost \$2,500.

Frank Barnekow, carpenter contractor, 1574 20th st., is erecting, for himself, on an adjoining lot, a bungalow, 28x40; costing \$3,400.

The Nunn-Bush Shoe Co., 409 4th st., is contemplating erecting a large manufacturing plant within the next few months.

Bernard Donath, carpenter contractor, is erecting a frame duplex on 37th st., near Wright st., 24x42; costing \$3,200.

The L. H. Geisinger Co., 543 31st st. is erecting a brick veneer duplex flat on State st. near 20th st., cost \$5,000.

Wm. F. Zuerner, carpenter contractor, 1466 24th st., is building a duplex at 1400 14th st., 26x42; costing \$4,000.

Fred W. Radtke, carpenter contractor, 1057 15th st., is erecting a residence on 26th st., costing \$2,200.

The L. H. Geisinger Co., 543 31st st. is starting a duplex flat on 29th st., near Hadley st., to cost \$4,500.

HEAD OF THE LAKES

Office: 206 Manhattan Building Telephone: Auto 3036.

Mail or telephone news not later than Wednesday.

DULUTH.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

Olsen & Eksort, garage, E. 2d st.	1,500
Matt Slayer, dwl., 95th av. W.	1,500
St. Louis county, brick garage, E. 2d st. near 6th av.	1,500
L. Ramstad, addition to brick garage, W. 1st st. near 4th	1,150
McKay Bros., repairs, 5th av. W.	1,000
M. J. Olson, frame dwl., 56th st.	2,500
J. Gallop, remodeling, E. 7th st. near 5th.	1,500
St. Louis County, brick garage, 6th and 7th av.	1,500
M. Stayer, frame dwl., 95th av. W.	1,500
T. H. Reed, frame dwl., 16th av. E. near 6th av.	2,000
J. E. Erickson, frame dwl., 23d av. W. near 8th.	3,000
J. H. Miller, remodeling, Magellan st. near 45th.	2,000
P. G. Hanson & Son, two frame dwls., 2d st. near 22d.	4,000
P. Halverson, frame dwl., Michigan av.	2,000

*Architects are reported to be working on plans for another new Duluth industry. Owners of a large woven wire fence factory at Anderson, Ind., have decided to build a plant at the head of the lakes and will start work soon as negotiations for a site have been closed. They have chosen the Gary townsite as a logical location for the new industry, the first one of its kind at the head of the lakes, and plan to install a 6-loom factory.

*Commissioner Leonidas Merritt, head of the utilities division, has opened negotiations with the Zenith Furnace Co., with a view to obtaining a reduction in the price which the city now pays the company for gas. The city is now paying the company 40 cents per 1,000 feet for gas used for lighting and cooking purposes and 37½ cents for that used for heating premises and for manufacturing.

*The Minnesota Radiator Co.'s plant, under construction since August, has begun operations, fifty men being employed; the structure is practically fireproof. The vaults are of tiling and concrete, the roof is of cement and gravel; electric trolleys will be used to move all heavy pieces.

*One day recently there were six prominent manufacturers registered at a local hotel. They represented firms in Winnipeg, Vancouver, Indianapolis, Tacoma, Seattle and Victoria, all of them looking into conditions with the view of locating their industries at the head of the lakes.

*Figures are being taken by Wangenstein & Gilinson, architects, upon the theater to be built by M. S. Cook on the site of the old St. James hotel on West Superior st. In the meantime the excavation for the foundation for the structure is proceeding.

*Plans are drawn for a public comfort station on 16th av. W., just above Superior st. Harry Cleveland, superintendent of parks, is in charge of the plans.

SUPERIOR.

BUILDING PERMITS.

Albert Hohnquist, dwl., 6318 John av.	2,000
F. E. Johnson, dwl., 561 W. 8th st.	4,000

OMAHA, NEB.

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

W. A. Russell, 1511 N. 13th, brick dwl.	1,800
A. E. Cramer, 2909 4th, frame dwl.	1,300
Axel E. Seastidt, 3423 Webster, frame dwl.	2,500
Chas. Nordin, 2432 Brown, frame dwl.	2,000

Southwest Improvement club advocated \$5,000,000 Union depot, in central location, suggesting 16th and Leavenwood.

All building records are expected to be broken in 1914. A great deal of work planned for this year and delayed by the big storm will be put through next year. Commissioner Withnell said material is cheaper than for some time. New construction for 1914 will include many dwellings, but the number of factories and office buildings will exceed all previous records. Many buildings will be remodeled.

The Baker Ice Machine Co. has supplied figures and plans for a plant at Walthill, Neb.; machinery, vat, piping, and insulation, estimated to cost about \$6,000; entire investment cost \$8,000; building about 24x40; ammonia compressor, 25 h. p. electric motor.

Chas. W. Martin & Co., 216 Omaha National Bank building, will erect a 2-story and basement residence, 28x26, stucco, siding, shingle roof, mantels, Everett S. Dodds, architect 322 Paxton building Omaha; cost \$4,000; owner taking bids.

A 2-story and basement residence will be erected by Benson & Carmichael, 624 Paxton Bank building, Everett S. Dodds, architect, 622 Paxton building; cost \$3,500, 24x26; siding, shingle roof; owner taking figures.

Contract awarded to Johnson Bros., 3152 Chicago st., for construction of a 2-story residence for R. B. Johnson, 2537 Cass st., 26x30, frame, private plans cost \$4,000; bids desired on all except brick and carpentry work.

A \$2,500 bungalow will be erected by Benson & Carmichael, 524 Paxton Bank building, 24x28, siding, shingle roof, 1½-story, Everett S. Dodd, architect, Paxton building, 622 owner taking figures.

John Latenser, architect, has returned from a four months trip in Europe.

Fire destroyed the dwelling of Ben Morrison; loss \$3,000.

WINNIPEG, MAN.

*The following permits were issued: An apartment block to be erected at the northwest corner of Wardlaw and Nasau. L. Pullmer is the owner and D. Abramovitch is the architect. The block will cost \$70,000; four dwellings on east side of McKenzie, between Mountain and St. John, to cost \$7,200, by R. Garn; two dwellings on west side of Telfer, between Wolover and Livinia, by W. L. Copping, \$6,000; the Credit Home Builders, Ltd., will erect a dwelling on north side of Chalmers, between Wolfe and Gray, costing \$1,500.

It is the intention of the Trades Expansion committee of the industrial bureau to begin work on the first two manufacturer's buildings to be erected on corner of McPhillips and Higgins av. in the spring.

The following permits were issued: W. Cooper dwelling, Strathcona st., \$1,200. A. Fido, four dwellings, Atlantic av., \$12,000; Manitoba Vinegar Co., stable on Selkirk av., \$1,000.

H. Thompson, secretary-treasurer, 215 Chambers of Commerce, city, has been receiving tenders for fire hall sites to erect fire halls on them in rural municipality of Kildonan.

A new broom manufacturing company has been incorporated under the name of the Winnipeg Broom Manufacturing Co., Ltd., and they will build shortly.

Tenders are wanted to Dec. 29, for railway ties and telephone poles, by commissioners, Greater Winnipeg water district, 901 Boyd building, city.

N. Herchenson, manager of West End Realty & Building Co. has gone to Europe, and while there will arrange next year's building operations.

Tenders are wanted to Dec. 26, by chairman board of control, city, for erection of an ice breaker, and navigation fender, at Louise bridge.

*A by-law was passed voting \$1,000,000 for the extension of the hydro-electrical works and system of the city.

*The remains of the Leland hotel is being torn down and plans are being prepared for a new building.

*A by-law was passed voting \$50,000 for lavatories, urinals, etc., for the city.

*A by-law was passed voting \$60,000 for suburban fire stations.

PROPOSAL ADVERTISING FOR BIDS

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posals will be published in this depart-
ment on receipt of copy with order from
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ment—15c per line each insertion. No dis-
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tomary to insure full and fair competition.

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COPY RECEIVED up to Friday, 10 a. m.,
will be published in the paper, delivered to
subscribers on Saturday, but should reach
the publication office, Lumber Exchange,
Minneapolis, earlier in the week, when pos-
sible.

LATE NOTICES Friday morning can be
transmitted by long distance telephone.

BITUMINOUS PAVEMENTS

Sioux Falls, So. Dak.

Sealed bids will be received by the
Board of Commissioners of the City of
Sioux Falls, S. D., at the office of the
City Auditor, up to 9 o'clock a. m., of
Monday, the 26th day of January, 1914,
for the construction of pavement on
Prairie Avenue from the north line of
Third Street to the south line of
Twelfth Street.

Bids will be received on each of the
following kinds of pavements; Bitu-
lithic, Tarvia Macadam, Asphaltic Con-
crete and Dolarway, to be constructed
in accordance with the plans and spec-
ifications on file in the office of S. B.
Howe, City Engineer of said City.

Each bid must be accompanied by a
duly certified check for the sum of
\$1,500.00 drawn on some known solvent
bank of the City of Sioux Falls and
made payable unconditionally to the
City Treasurer of the City of Sioux
Falls, S. D., as a guarantee that the
bidder will, his bid being accepted, en-
ter into a contract with and furnish the
required bond, to said City.

The work will consist of approximate-
ly the following quantities; 15,000 sq.
yards of pavement outside of street
car tracks; 3,000 sq. yards of pavement
along street car tracks.

Specifications and blank form of pro-
posal may be obtained from S. B.
Howe, City Engineer.

Each bid must be endorsed on the
outside with a statement showing the
work covered by the bid and must be
filed with the City Auditor before the
hour above mentioned.

The right is reserved to reject any or
all bids.

Sioux Falls, S. D., this 16th day of
December, 1913.

WALTER C. LEYSE,
City Auditor.

(Continued on Page 24.)

PROFESSIONAL DIRECTORY

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DES MOINES, IOWA

Bert N. Mills, Representative, 310 Hubbell Building.

BUILDING PERMITS.

Benson & Marner of Des Moines, general contracting firm, has been awarded the general contract for a 4-story building, NE. corner of E. 1st and Shepard sts., to be used by Swift & Co., packers, as a local branch. The Des Moines Ice & Cold Storage Co. will erect the building. J. G. Black is the manager; cost \$135,000; 170x84, to be completed May 1, 1914; concrete and thoroughly fireproof. A large capacity for refrigerating will be provided. Swift & Co. officials here announce that this will be the largest single building in the country devoted exclusively to the buying, preparation and shipping of produce. Refrigeration and steam for the building will be supplied from the plant of the Des Moines Ice & Cold Storage Co., one block north.

Christiansen Brothers, implement dealers at Humboldt, are buying materials for a new store building which is to be built of cement blocks. It will be 82x100, 1-story and basement. Jess W. Porter, Porter Hardware Co., Altoona, announces plans for a 3-story and basement brick business block which he will build on a site 30x150, adjoining his present store. The company owns the site for the new building. Its former warehouse, owned outside the firm, recently was destroyed by fire.

Za-Ga-Zig Temple, Des Moines organization of the Mystic Shrine, will decide this month on plans for a proposed \$100,000 temple building; site has been secured; formal action is to be taken at the annual meeting to be held Dec. 19 or 26. The membership of the local temple is 2,000 and represents 26 Iowa counties.

Richard D. Snell of Clinton, Ill., announces plans for building 2 modern fireproof business blocks in Ft. Dodge, Iowa. One will be 6-story and the other 7. Together they will cover a ground space 120x140. It is estimated that the cost will be \$200,000.

The Pella Commercial Club has launched a movement to promote a project for a concrete paved roadway from Pella to Knoxville. The Des Moines river is to be crossed about midway between the two cities.

Permit was for the erection of the Mondamin Avenue Church of Christ, to be located at E. 16th st. and Mondamin av. Construction work is in progress; cost \$5,000.

Redfield, a thriving town on the River-to-River road west of here, has completed its municipal electric lighting plant; street, store and home service is afforded.

The annual meeting of the Enamel Concrete Co., of Des Moines will be held in the offices of the company, 417 Hubbell building January 13, 1914, at 10 a. m.

A 2-story brick and stucco residence will be erected at 811 Prospect boulevard by C. E. Campbell of the Campbell Heating Co.; permit issued.

FARGO, NO. DAK.

Mail or telephone news not later than Wednesday.

Plans for a 4-story school building to be erected by the Sacred Heart Academy have been received at the Builders' Exchange; cost \$60,000, 108x48, pressed brick construction; contract let Dec. 16.

Contract let to N. E. Carter for erection of a duplex brick dwelling at 24th and F sts. S. for Sir Horace Plunkett and Conrad H. Young; cost \$8,000.

Fire damaged the Lee Bros. grocery store on N. P. av.

SEATTLE, WASH.

Notes Arranged Alphabetically by States.

BUILDING PERMITS.

Henry J. Brice, 4034 Densmore av., 1½-story residence....	2,000
Eric Anderson, 1808-10 N. 40th st., 2-story residence.....	4,000
J. M. Colman Co., 812 Western av., alterations.....	2,000
Chas. Wilke, 1916 2d av. N., 1½-story residence.....	2,000
F. M. Dever, 2537 2d av. W., 1-story residence.....	2,000
Martin Landem, 4658 Henderson st., 1-story residence....	1,800
W. R. C. Cook, 6532 15th st. NW., 1-story residence.....	1,200
B. Ginspepe, 531 28th av. N., greenhouse.....	1,000
H. C. Green, 4320 Latona av., 1½-story residence.....	2,500
C. A. Olsen, 5239 22d av. NE., 2-story residence.....	3,500
Hilroy A. Foster, 813-17-21-23 7th av., move four residences back	1,165
Seattle Brewing & Malting Co., 6010 DuWashish av., shelter shed	2,000
A. N. Miroy, 2004 E. 52d st., 1½-story residence.....	2,500
C. P. Dose, 3305 Dose Terrace, 2-story residence.....	4,000
G. Weed, 445 27th av. N., 1-story residence.....	1,200
Northwestern Bungalow Co., 136 E. 52d st., 1½-story residence	2,000
Canal Lumber Co., 1048 N. Ewing st., lumber shed.....	2,500
City of Seattle, 1160 Aloha st., street railway sub-station..	10,000

F. Roy, 216 Roy st., 1½-story residence.....	1,800
Kate & Cooper estate, 1425 E. Prospect, remodeling.....	2,000
R. N. Gibson, 4736 Latona st., 1-story residence.....	2,750
Wm. H. Hainsworth, 1906 California av., 1½-story residence	3,000
J. W. Holmes, 8041 1st NE., 1½-story residence.....	2,000
Herbert A. Jones, 4233 Fremont av., 1-story frame residence	4,000
L. Allison, 663 E. 75th st., 1-story frame dwl.....	1,200
C. P. Dose, 5202 Dose terrace, 2-story residence.....	3,500
L. Danz & Sons, 406 1st av., install moving picture show....	3,000

SIoux CITY, IOWA

Sioux City Office: 310 Iowa Building; R. V. Sager, Representative.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

Mrs. Nellie Johnson, frame dwl., Lawn Ridge add.....	1,500
Mabel L. Fulton, frame dwl., Cheney's Lakeport add.....	2,000
Northwestern Realty Co., frame dwl., Oak Park add.....	4,000
M. Bender, frame dwl., Hedge's add.....	7,000
Samuel C. Freiden, repairs and addition to building, Higman's Park add.....	1,200

The remodeling for the Royal theater will be completed next week. It is to be used as a moving picture house. The lobby will be 25x40, and all finished in white. The inside of the theater will be 50x100 with a seating capacity of 850. The interior decorations will be art nouveau style.

Wm. L. Steele, architect, United Bank building, has prepared preliminary sketches for the board of supervisors of Woodbury county for the proposed new county court house for Woodbury county. The estimated cost of the new structure is \$1,000,000.

A planing mill is being erected at Leeds. It will have ground space, 40x48, and will cost about \$4,000. It will put out windows, sash, doors, etc.; Merritt Smith is the contractor.

Geo. W. Burkhead, architect, Grain Exchange building, is drawing plans for a bungalow for B. F. Bryson at 27th and Jones sts. It will be 26x34, and will cost about \$3,000.

The new heating plant for the Chicago & North Western Railway station is about completed and will be in operation in about a week.

James Weir is constructing a garage at Leeds. It will be frame construction and 40x50 in dimensions.

STREET AND ROAD WORK

Notes Arranged Alphabetically by States.

Ariz., Bisbee—Bids soon to be called for on paved street from Bisbee to Warren, about 2.45 miles, or 39,560 square yards; bids to be asked on bitulithic, Warrenite or macadam concrete; estimated concrete, \$30,000; address county clerk.

Ariz., Yuma—Plans being prepared by E. H. Kellogg, highway engineer, for roads throughout Yuma county to cost about \$500,000.

Colo., Fort Collins—Council planning on curb, gutter and surfacing on Jefferson st., improvement district No. 1, to cost about \$6,000; Ray Baxter, city clerk.

Ida., Jerome—Special election Dec. 22, on issuing bonds in the sum of \$4,000 for cross walks and street intersections; address city clerk.

Iowa, Audubon—Hearing by city council January 8 on grading, curbing, guttering and paving on a large number of streets, paving to be one or more of ten different kinds of material; S. W. Crowell, city clerk.

Iowa, Carroll—Commercial club favors paving several blocks in residence district with concrete and the streets in the business district with brick.

Iowa, Cherokee—Hearing Dec. 22, on paving of Main, 1st, 2d, 4th, Elm, 5th, Maple and Pine sts., to be of concrete, asphalt or bituminous concrete or brick block; Wm. Shardlow, city clerk.

Iowa, Clear Lake—A large amount of paving is in prospect; address city clerk.

Iowa, Davenport—The following are the streets agreed upon by the city council, on plans and estimates by the commissioner of public works, for improvement next year: McClellan blvd., middle road, East st., Ridgewood av., High st., Grand av., Columbia av., Harrison st., Scott st., Western av., Division st., Hickory Grove road, Washington st., Taney st., Cedar st., Rockingham road, Henry st., Summit av., Esplanade av., Myrtle st., Fair av., Hayes st., Newbury st., Pleasant st., 2d st., Lincoln av. and 8th st.; address the city clerk.

Iowa, Fort Dodge—Estimate by R. C. Kenly, chief engineer, Minneapolis & St. Louis Railroad, is that the proposed highway north from Central av. will cost about \$49,000 instead of \$30,000 as estimated by H. Reynolds, city engineer; a long trestle and fill will be necessary across soldier creek valley.

Iowa, Ida Grove—Paving is being much discussed, Julius Rohwer, being active in urging it; the Barber Asphalt Co. has had a representative on the ground; address city council.

Iowa, Indianola—Paving is proposed for 1914 and officials

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PROPOSAL ADVERTISING FOR BIDS.

PROPOSALS WANTED.

Jail and Sheriff's Residence, Carlton, Minn.

Sealed proposals will be received by the County Board of Commissioners, Carlton County, Minnesota, August R. Norman, County Auditor, for the erection and completion of a Two-Story Jail and Sheriff's Residence to be erected at Carlton, Minnesota, according to plans, specifications and details as prepared by the Architects, Vernon J. Price & Company. Said proposals to include separate bids on General Contract, Plumbing, Heating, Wiring and Cell Work. Sealed proposals on the above work will be opened by the County Board of Commissioners, at Carlton, Minnesota, at 10 o'clock on Jan. 6, 1914. A certified check shall accompany each bid, made out to the order of William Gallagher, County Treasurer. Said certified checks to be of the following amount as covered by each part of the work:

General Contract	3% of Bid
Cell Work	5% of Bid
Plumbing	10% of Bid
Heating	10% of Bid
Wiring	5% of Bid

Plans and specifications are on file at the office of August R. Norman, County Auditor, Carlton, Minnesota, and at the offices of the Architects, Vernon J. Price & Co., 608 Palladio Building, Duluth, Minn., or Rexall Block, Crosby, Minn. Separate copies of plans, specifications and details for personal use may be had upon application to the architects, accompanied by a check of \$10, which will be returned to bidder when plans are returned.

The right to reject any of said bids is reserved by the County.

By order of County Board, Carlton, County, Minn.

By AUGUST R. NORMAN,
County Auditor,
Carlton, Minn.

NOTICE TO CONTRACTORS.

Sealed proposals will be received by the Board of Education of Montevideo, Minn., on or before 4 o'clock P. M., Monday, Dec. 29, 1913, for the erection and completion of a new school building, according to the plans and specifications of William B. Ittner, architect, which may be viewed at the office of the Board of Education, Montevideo, at the office of the Builders' Exchange, Minneapolis, St. Paul and Duluth.

The Board reserves the right to reject all bids.

C. A. FOSNES,
Clerk.

MOODY COUNTY COURT HOUSE.

Flandreau, S. D.

Sealed proposals, directed to Mr. G. A. Chorpene, County Auditor, Flandreau, S. D., and endorsed, "Court House" will be received on or before the 6th day of January, 1914, at 2 o'clock P. M., for all labor and material required in the erection and completion of a stone, three-story, fireproof Court House, according to plans and specifications prepared by Joseph Schwarz, architect, Sioux Falls, S. D. Said bids will be opened at the first above mentioned time and place, by the Commissioners of Moody County, S. D., who reserve the right to reject any and all bids.

Each bid is to be accompanied by a certified check of a sum equal to 2 per cent of the amount of the proposal, made payable to Edgar A. Hornby, Treasurer.

Copies of the plans and specifications are on file at the Builders' Exchange in St. Paul and Minneapolis, Minn., while a limited number may be obtained, upon a deposit of \$20.00, from the County Auditor by general contractors, the same to be returned within 10 days after they are loaned, when the deposit money will be returned.

Contractors desiring the loan of a set

of plans, for their own use and for the purpose of estimating only, can procure them from the architect, upon a deposit of \$20.00. Said plans shall be returned to the architect, at the time of letting, whereupon one-half of the deposit will be refunded.

GEO. A. CHORPENING,
County Auditor,
Flandreau, S. D.

AUCTION SALE OF DREDGES.

In the Matter of the Standard Drainage Co., Bankrupt.

The undersigned will sell at public sale to the highest bidder for cash at No. 202 Odd Fellows' building, Mankato, Minnesota, on December 27th, at two o'clock, P. M., the following personal property belonging to said estate, to-wit:—

One Bellefontaine floating dredge, has a yard dipper, 35-foot boom, hull 18 by 65 feet, 45 horse power boiler, appraised value \$1,500, and now located at the west end of Lateral 6, State Drainage Ditch No. 90, one-half mile east of the Village of Karlstad, Minnesota; also one Bellefontaine floating dredge, has a yard and a quarter dipper, 40-foot boom, hull 18 by 65, 50 horse-power boiler, appraised value \$1,500, now located at State Ditch No. 84 near Lancaster, Minnesota; also one Bellefontaine floating dredge, has a yard and a half dipper, 45-foot boom, hull 22 by 70, 70 horse power-boiler, in first class condition, appraised at \$4,000, and located one and three-fourths miles west of the Village of Karlstad, Minnesota; and also one centrifugal six-inch suction pump and one centrifugal eight-inch suction pump; one timber 8 by 10, 36 feet long, and one timber 12 by 12, 26 feet long.

For further information write OLAF E. SELNES, Trustee, Windom, Minnesota.

(Continued on page 26.)



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are inspecting different sorts in other cities; J. W. Slocum, mayor.

Iowa, Le Mars—Council will include asphalt as material when bids are asked for Main st. paving; K. C. Gaynor, engineer, Sioux City.

Iowa, Leon—Petition will soon be presented the council for paving of north end of Main st.; address city clerk.

Iowa, Marion—Hearing at regular meeting of the council in January on large amount of paving, with either vitrified brick, concrete, creosoted wood, bitulithic, dolarway or tarvia, to be laid on a 5-inch concrete foundation; address city clerk.

Iowa, Pella—The Commercial club is discussing the building of a concrete road from the city to the Des Moines river; committee appointed to investigate cost, etc., and report.

Iowa, Sac City—Plans for paving involving \$60,000 being prepared by Bruce & Standeven, Bee building, Omaha, Neb.; hearing on remonstrance Jan. 19; W. F. Weary, city clerk.

Iowa, Sioux City—A number of petitions are being got in shape file at an early date for street improvements in Morningside; the expectation is to get some of them in shape for early action.

Iowa, Waukon—Bids received by J. D. Cowan, city clerk, until 7 p. m., Jan. 2, for approximately 21,000 square yards vitrified brick pavement on a concrete foundation; plans and specifications by the Aetna Engineering Bureau, 17 N. La Salle st., Chicago, Ill.; check for \$4,000.

Iowa, Webster City—Residence district of city west of Des Moines and south of 2d st. will be paved; address city clerk.

Kan., Atchison—City engineer instructed to proceed with preliminaries for paving S. 6th st., between reservoir and Jackson park; expected work will begin about March 1; address city clerk.

Kan., Concordia—Bids received by L. W. Lash, city clerk, until Dec. 29, for vitrified pipe sewers costing \$15,000; E. E. Harper, engineer, Grand av., Temple, Kansas City, Mo.

Kan., Concordia—Plans for brick paving here are being prepared by Worley & Black, engineers, Reliance building, Kansas City, Mo.; address city clerk.

Kan., Pittsburg—Petitions circulating for paving several streets in the spring; A. Messenger, street commissioner.

Minn., Albert Lea—Contract with Ilstrup & Olson for sewer work at \$8,200; C. J. Dudley, city clerk.

Minn., Brainerd—Estimate of city surveyor accepted for pavement on Kingwood and 3d sts.; also, bonds authorized for \$22,000 for street across East Brainerd ravine, special election to be held Jan. 6.

Minn., Crookston—City council has ordered paving of parts of S. Ash st., Spendley st. and Holly av., with Westrumite asphalt and city clerk ordered to advertise for bids; A. M. Childs, city clerk.

Minn., Duluth—Bids for state rural highway No. 4, have been rejected as being too high; the proposed improvement is about 32 miles long, extending westerly to the St. Louis county line, and Engineer Coe's estimate, was \$112,500; there were but two bidders, John Bergman and Preston & Kribsback. The work will be re-advertised.

Minn., Duluth—The 1914 street improvement program provides for the expenditure of \$500,000 and represents only the most urgent work. Commissioner Murchison announces that the program will be adhered to and that the work will be taken up in the following order, the street or avenue on which the work is to be done only being given: Victoria st., paving; Woodland av., paving or surfacing; West Superior and Oneota st., improvements; Vermillion road improvement; Vernon st., paving; 5th st., paving; St. Croix av., paving, including also Sutphin st.; Lake av., paving and desirable to advance this to No. 6; 5th st., grading; Helm st., grading; 29th av., paving; 20th av. east, paving; 6th st., grading, etc.; 1st st., grading and paving; 3d alley, paving; Colorado st., grading and graveling; Wicklow st., grading; Red Wing and Caribault sts., guttering and graveling; 6th st., grading; 3d av. east, grading; 1st alley, paving; 5th alley, grading and paving.

Minn., Faribault—City contemplates 21 blocks pavement in the spring; probably creosote block; Frank McKellip, city engineer.

Minn., Grand Rapids—Bids received by M. A. Spang, auditor Itasca county, until 10 a. m., Dec. 18, for work on road No. 123, in Blackberry and Feeley townships; check for 5 per cent.

Minn., Mankato—Street improvements are contemplated for the spring as follows: N. 4th st., 9,759 cubic yards excavation, \$2,439.75; 1,082 cubic yards, grading, \$811.50; boulevarding, \$350. Madison av., 1,656 cubic yards excavating, \$414; 350 cubic yards graveling, \$262.50; boulevarding, \$60; also 15 blocks of paving on 2d N. Front, Washington and Spring sts. F. W. Bates, city clerk.

Minn., Mazeppa—Bids received by Chester Winters, chairman of supervisors of the town of Chester, at Mazeppa, until 1 p. m., Dec. 27, for rock, hauling of same and hauling of sand.

Minn., Minneapolis—The street opening commission recommendation on opening and widening of 7th st. from Hennepin av. to Lyndale av. at a total cost of \$567,400 has been approved. The work is to be done under the Elwell act, and benefitted property owners are to pay two-thirds the cost in 20 equal annual instalments, the city to pay a third of the cost. W. G. Nye, mayor.

Minn., New Ulm—Petition in hands of Commercial club for paving principal streets of city, either with concrete, creosote blocks or brick; address city clerk.

Minn., Red Wing—Surveys for a road from Red Wing to Zumbrota, 22 miles, are being made by Wm. J. Geisheker, engineer, city, for the state highway commission, St. Paul.

Minn., St. Peter—New specifications ordered for brick gutters on Minnesota av., from Broadway to Mulberry st.; address city clerk.

Minn., West St. Paul—All bids rejected; will not build a wooden sidewalk this year.

Minn., Winona—Unfinished work on concrete highways will probably be readvertised without delay by the county board; J. E. Voelker, chairman, board.

Minn., Winona—A concrete road 2,500 feet long contemplated for the spring; H. B. Walling, city engineer; George Hoffman, city clerk.

Mont., Bigfork—City clerk has been instructed to advertise for bids for repair and reconstruction of sidewalks; address city clerk.

Mont., Great Falls—Bids received by W. H. Harrison, city clerk, until 8 p. m., Dec. 22, for grading for standard boulevard on 8th st.; also, at same time, for grading for standard boulevard on 10th st.; three contracts; checks for 10 per cent.

Mont., Lewistown—Council ordered paying of a short strip on Main st. at the Milwaukee right-of-way; address city clerk.

Mont., Livingston—Petition to council for paving Callander st. from 3d to E st.; address city clerk.

Mont., Missoula—City council ordered paving of Main st. at cost of about \$40,000; address city clerk.

Neb., Kearney—Bids for paving in district No. 3, will soon be advertised for; address city clerk.

Neb., Nebraska City—Paving alleys in rear of business houses is proposed; T. N. Hartzell, city clerk.

Neb., North Platte—The city is discussing the need for paving; address city clerk.

Neb., Omaha—Preliminary steps taken for curbing and paving 15th st. from Vinton to Deer Park blvd.; Thos. J. Flynn, city clerk.

Ore., Portland—Details of the large amount to be expended by Multnomah for road work are as follows: grading of Columbia River highway, from Chanticleer to the county line, estimated cost, \$158,000; paving of Riverside drive, road district No. 2, estimated cost \$38,800; paving of Base Line road to Auto club roadhouse, estimated cost \$156,000; revising grades and the alignment of base line road, estimated cost \$175,000; paving Linnton road, three miles, estimated cost, \$36,000; paving Canyon road, estimated cost, \$36,000; opening of new road along the Sandy river, between the bridges across the Sandy at Troutdale revising grade and alignment in existing roads to be hard surfaced, estimated cost, \$25,000.

S. D., Sioux Falls—Bids received by Walter C. Leyse, city auditor, until 9 a. m., Jan. 26, for paving on Prairie av., 18,000 square yards in all; check for \$1,500; officially advertised in this issue of the Improvement Bulletin.

Texas, Commerce—Board of trade taking preliminary steps to inaugurate campaign for issuing bonds for \$200,000 to build and improve roads address city clerk.

Texas, Greenville—Special election called by commissioners' court for Dec. 27, to vote on bonds for \$400,000 for 80 miles of pike roads through the county; address commissioners' court.

Texas, Montgomery—Citizens voted bonds for \$150,000 for road construction; address mayor.

Texas, San Antonio—Bids soon to be received for 25 miles of pavement; A. C. Pancoast, city engineer.

Wash., Charleston—Hearing Dec. 22 on improvement of Summit av. with cement sidewalks, city clerk.

Wash., North Bend—City recorder instructed to advertise for bids for the improvement of parts of Union and Washington sts.

Wash., Olympia—Plans ready for bidders, but await securing right-of-way on following roads; Pacific highway, Lewis county, \$20,000 Pacific highway, Cowlitz county, \$25,000; Pacific highway, Clark county, \$40,000; Sunset highway, Douglas county \$31,000; total \$116,000 available. Wm. R. Roy, state highway commissioner.

Wash., Port Angeles—Bids received by C. E. Shields, city clerk, until Dec. 30, for improvement of Railroad av., Front st., 1st st., Lincoln st., 3d st., Laurel st., Oak st. and alleys in blocks 15 and 16; plans on deposit of \$10.

Wash., Seattle—H. C. Henry offers to pave 2d av. with

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PROPOSAL ADVERTISING

SEALED BIDS WANTED

Sealed bids will be received by the City Council of the City of Montevideo, Minn., for furnishing the material and constructing 2,142 feet of sanitary sewer, according to the plans and specifications on file with the City Clerk; up to Monday January 5th, 1914 at 8 o'clock, P. M. A certified check for 10 per cent of the amount must accompany all bids. The Council reserves the right to reject any and all bids.

Dated at Montevideo this 16th day of December, 1913.

A. M. PARKS,
City Clerk.

PROPOSAL ADVERTISING FOR BIDS.

MECHANICAL EQUIPMENT STATE SANATORIUM.

State Sanatorium, Minnesota.

Sealed proposals will be received by the State Board of Control, at their office in the State Capitol Building, St. Paul, Minn., until 2 P. M., Friday, January 2, 1914, for the boiler and power plant, and mechanical equipment of Recreation Building, Children's Camp House, Service Building and Plumbing and Laundry Wings of the State Sanatorium, State Sanatorium, Minnesota, in accordance with the plans and specifications of Charles L. Pillsbury Co., Engineers, 805-811 Metropolitan Life Building, Minneapolis.

Bids are to be accompanied by certified check for five per cent of the

amount of the bid, payable to the State Board of Control, which check will be returned when contract is executed.

Copies of the above plans and specifications may be seen at the Superintendent's office, State Sanatorium, State Sanatorium, Minnesota; at the Builders' Exchange, Minneapolis; at the Builders' Exchange, St. Paul; at the Builders' Exchange, Duluth; at the office of the Board of Control; and at the office of the Engineers. Extra copies of plans and specifications may be obtained on application to the Engineers on payment of cost of duplication. Successful bidder must furnish the Board with a surety bond in 75 per cent of the amount of contract. The right is reserved to accept or reject any or all bids.

WANT ADS SPECIAL NOTICES

NOTICES under this heading will be inserted at the rate of fifteen cents per line, each insertion; no notice inserted for less than 50 cents.

SETTING SEMAPHORES BY WIRELESS.

A series of extremely interesting experiments have been conducted by the Lackawanna railroad in the use of wireless telegraphy. Readers of these columns have already been told how this road turned to its wireless equipment not long ago when a severe storm of sleet put out of commission all its telephone and telegraph wires in its "mountain division." For two hours train orders were then handled by wireless, and 54 such orders were transmitted and received without a break.

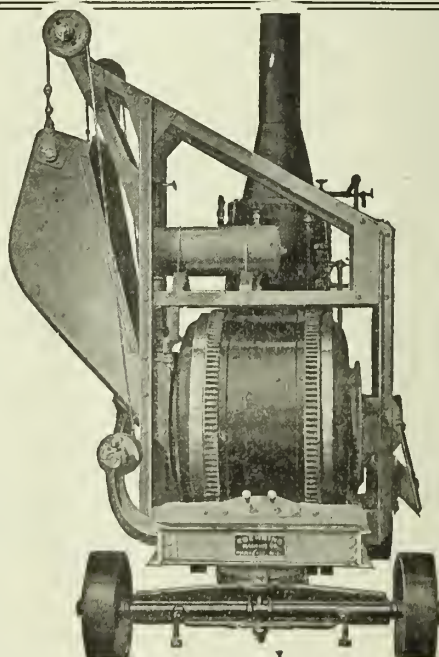
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creosoted blocks at his own expense, the city to pay him at the end of the year if it is satisfactory; if not, he will take it up at his expense.

Wash., Westport—Citizens voted to issue bonds in sum of \$180,000 for grading and sidewalks; address city clerk.

Wis., Eau Claire—City contemplates 8 blocks of concrete paving in the spring; J. C. Fennessey, city clerk.

Wis., Fond du Lac—Bids will be advertised for about Feb. 1, for 3 miles of cement paving; J. S. McCullough, city engineer; J. F. Hohensee, city clerk.

Wis., Green Bay—Bids received by George J. Cormier, highway commissioner, until 11 a. m., Dec. 30, for the following road machinery: two 10-ton gasoline or steam road rollers; 2 2-horse graders, Russell or equal; 2 500-gallon sprinklers; 2 standard railroad plows; 2 roter plows; 2 rock crushers complete with screen and 20-ton bins. Crushers not smaller than 10x18 or 11x22. A deposit of \$50 will be required with each bid.

Wis., Marquette—Committee of board reports expenditure of \$1,363 for road machinery comprising one road sprinkler, complete with pump and fixtures; 2 dump wagons; 6 No. 2 wheel scrapers, 8 No. 2 slush scrapers; 1 roter No. 20; 1 little grader; 1 road drag; 1 No. 6 road plow; 1 sprinkler attachment; 1 light truck wagon for tool house, small tools, lumber for culvert forms; committee recommends \$1,500 as machinery fund for next year; A. H. Schatzka, chairman committee.

Wis., Waukesha—The Oconomowoc-Milwaukee road association is considering construction of a concrete or macadam road from Milwaukee to Oconomowoc; estimated that concrete road would cost between \$12,000 and \$15,000 per mile, while a macadam road would cost from \$3,000 to \$5,000; Guido J. Hansen, treasurer.

CONTRACTS AWARDED.

Ariz., Tucson—Contract with Arizona Asphalt Paving Co., Phoenix, for paving on Congress st., at \$62,440. The Barber Asphalt Co. bid \$62,213; work includes grading, bitulithic paving, concrete curbs, gutters and culverts, vitrified sewer, 3 man-holes, flush tanks and lamp holes.

Iowa, Des Moines—Contract with the Des Moines Asphalt Co. for patching the paving on West Grand av. at \$1 per square yard.

Iowa, Keokuk—Contract has been made with the Keokuk Quarry & Construction Co., for a concrete roadway on Water st., in all about one and one-half blocks.

Iowa, Pomeroy—Contract has been let to have streets curbed and guttered next spring; address city clerk.

Minn., Buhl—Contract with Hibbing Lumber Co. for concrete mixer at \$350, f. o. b. Buhl; bid of Butler Coons Co. was \$380.

Minn., Mankato—Contract to S. A. Rouse, city, on culverts, \$198; also, to John Keogh, St. Peter, for grading \$1,033.

Mo., Nevada—Contract to macadamize S. Main st. awarded to Henry Pohl, at 28.5c a square yard; W. C. Brow bid 30c; both of Nevada.

Mont., Anaconda—Contract with S. Birch & Co., for cement walks to College st. district, involving about 15,000 square feet of walks; address city clerk.

Mont., Hamilton—Contract with Clifton-Applegate Co. for Bitter Root-Big Hole road, subject to approval of secretary of agriculture and also dependent on same firm securing the Beaverhead part of the road across the mountains.

Ore., Jacksonville—The details of the bid by which the Keasal-McDowell Logging Co., Tacoma, Wash., secured the contract for improving the Pacific highway in Jackson county from the California line to the Siskiyou mountains were as follows: 134,428 cubic yards earth excavation including hauling of 300 feet, 29c; 21,804 cubic yards loose rock, 38c; 43,412 cubic yards solid rock, 78c; 13,813 square rods clearing (light) 50c; 1,700 square rods grubbing, \$1.40; wrought iron and spikes in structure, 6c per lb; timber and plank per M. feet, \$28; 4,036 lineal feet corrugated iron pipe, 12-inch \$1.05; 40 lineal feet 18-inch \$1.60; 576 lineal feet 24-inch \$2; 4,036 lineal feet concrete pipe 12-inch 72c; 40 lineal feet 18-inch \$1.60; 576 lineal feet 24-inch, \$2; 4,036 lineal feet vitrified tile, 12-inch, 70c; 40 lineal feet 18-inch \$1.30; 576 lineal feet 24-inch; \$2.53; 593 cubic yards concrete class "A" \$11; 89 cubic yards concrete, class "C" \$10; 70,000 pounds reinforcing steel per 100 pounds \$60; total, \$107,534.

S. D., Armour—Contract for metal culverts made with T. W. Fotheringham, city; other bidders were: Sioux Falls Metal Culvert Co., Sioux Falls, Iowa; Russell Grader Co., Minneapolis, Minn.; Minneapolis Steel & Machinery Co., Minneapolis, Minn.

Wash., Burlington—Contract with Brooks & McMannis, city for cement sidewalk on Regent st. at \$849.

Wash., Seattle—Contract for sidewalk of Broad av., Magnolia to Lirgerwood st., let to Mitchell Bros., at their bid price of \$6,400. C. M. Payne bid \$6,289 on same job; contract for

grading and curbing of Broad av., Lirgerwood to Magnolia st., let to Mitchell Bros., at \$6,898. Contract for the grading and ballasting of Trent av. from the W. Olive av. bridge to vacated Grant st., let to J. B. Mitchell for \$1,500. Contract for curbing of Jackson av., Monroe to Cedar let to A. D. & F. B. Robinson at \$1,094.

Wash., Seattle—Contract for paving 8th av. with brick has been awarded to L. R. Ellis, American Bank building, at \$69,333.

Wis., Chippewa Falls—Contracts have been let to John Taylor and Edw. Nelson of Flambeau to clear the right-of-way on twelve miles of road in the town of Cleveland.

SEWERS

Notes Arranged Alphabetically by States.

Ill., Salem—Plans for a sanitary sewer system and purification plant to cost \$88,000 are being made by John Spiker, engineer, Vincennes, Ind.; 8 to 22-inch vitrified pipe; will advertise for bids in the spring; W. D. Wyatt, chairman board local improvements.

Iowa, Adel—All bids on sewer work rejected; new bids received by Vic. T. Sweeley, city clerk, until Jan. 5, for a sewer 1,320 feet long, 8-inch pipe; check for \$100.

Iowa, Cedar Rapids—Kenwood district expects to put in a sewer system of its own next spring; address city clerk.

Iowa, Clarion—Plans contemplated for about 5½ miles sewer work; definite announcement expected about Feb. 1; address city clerk. Engineer Carrie, Webster City, has plans nearly perfected; cost about \$40,000.

Iowa, McGregor—Bonds have been voted here for a \$75,000 sanitary sewer system; address city clerk.

Iowa, Red Oak—Resolutions of necessity for a sewer on certain streets to be presented at the next meeting of the council petition has already been made address city clerk.

Iowa, Sioux City—Resolution calling for 26 blocks sanitary sewer to cost \$7,000 adopted by Cole's addition improvement association; matter will be presented to council and bids asked for immediately; address M. M. Noonan, chairman of committee.

Kan., Atchison—Bids received by Victor L. King, city clerk, until Jan. 5, for 1,200 feet 10-inch vitrified pipe sewer, 2,900 feet 8-inch, and 15 man-holes; Frank C. Altman, city engineer.

Kan., Concordia—Bids received by L. W. Lash, city clerk, until Dec. 29, for sanitary sewers requiring 21,165 lineal feet 8 to 15-inch vitrified pipe.

Mich., Grand Rapids—Preliminary plans being prepared by L. H. Stevens, city engineer, for a sewage disposal plant to cost \$500,000; L. D. Cutcheon, clerk board public works.

Minn., Litchfield—Hearing to be held in January on petition for a sewer to run north from Washington school building; address city clerk.

Minn., Montevideo—Bids received by A. M. Parks, city clerk, until 8 p. m., Jan. 5, for 2,142 feet sanitary sewer; check for 10 per cent; officially advertised in this issue of the Improvement Bulletin.

Minn., Pipestone—Preliminary steps taken for 8-inch sewer from intersection of French and Cottonwood sts. to Blain st.; S. W. Funk, city clerk.

Minn., Wabasha—Council will receive bids for sewer system until Jan. 27; J. M. Schouweiler, village recorder, from whom plans can be had.

Mont., Butte—(Re-advertisement)—Bids received by W. A. Willis, city clerk, until 5 p. m., March 1, for a sanitary sewer in Mercury and Diamond sts.; plans of city engineer; certified check, \$1,000.

Neb., Alliance—C. A. Dow has been instructed to purchase additional pump for use at the septic tank.

Neb., Benson—Citizens are talking sewer work; address city clerk.

Neb., Laurel—Bids soon to be advertised for 8 to 12-inch vitrified pipe sewer, costing \$7,000; Bruce & Standeven, engineers, Bee building, Omaha; P. Stewart, city clerk.

Neb., Omaha—Plans for sewer work amounting to several hundred thousand dollars are being worked out by the city engineer, but not more than \$100,000 can be expended next year; address city clerk.

Neb., Ravenna—Plans for the sewer work are being prepared by Grant & Fulton and were considered by the council on the 15th; address the city clerk.

Sask., Estevan—City council contemplates installing sewer system; P. J. Stephens, secretary-treasurer.

Utah, Provo—Bids received by Fred Evans, city recorder, until 10 a. m., Dec. 28, for 947.5 feet of sewer work; plans for a deposit of \$2.

BEFORE THE WINTER WINDS COME--BE PREPARED

WHEN you are making final repairs for the winter, do not fail to mention LINOVELT to your customer. Put it in the walls and roof of his home, and the comfort and saving in fuel which the use of this greatest of all Cold, Heat and Sound insulations will give him, means an increase of business for you. New or Old Buildings---There is a Way. We Have It Write Today **UNION FIBRE COMPANY, -:- Winona, Minn.**

Wash., Puyallup—Council passed ordinance for two storm sewer districts, bids to be advertised for at once; cost \$3,715.

Wash., Seattle—Plans completed by A. H. Dimmock, city engineer, for sewers on Swift av. to cost \$18,000.

Wis., Chippewa Falls—City contemplates five blocks of sewer in Main st.; A. T. Thompson, city engineer; L. J. Felix, city clerk.

Wis., Fond du Lac—Bids will be advertised for about Feb. 15 for 1½ miles of 8- to 18-inch vitrified pipe sewer; J. F. Hohensee, city clerk.

CONTRACTS AWARDED.

Minn., St. Paul—Contracts for sewer work have been let as follows: Christ. Johnson—Tallula Place, \$307; Jessamine st., \$826; Roy st., \$1,169; Herschel av., \$498; Blair st., \$1,034. C. A. Carlson—Sylvan st., \$324; Montrose av., \$1,350; Orange st., \$879.

Minn., Tracy—Contract let to H. J. Cathroe Co. for sewer on 3d st. at \$2,586. Other bidders were J. G. Rea, \$2,863; H. Coolsaet, \$2,618.

Sask., Regina—Contract to O. W. Smith for an additional filter bed to cost \$14,000; F. McArthur, engineer; L. A. Thornton, city commissioner.

Sask., Swift Current—Contract to McManus Contracting Co., Moose Jaw, for sewers and water mains; \$10,600 for sewer tile and \$6,622 for water pipe.

Wyo., Cheyenne—Contract with P. N. LaFontaine, Cheyenne, Wyo., for sewer and connections at \$1,275. Other bidders were Jas. Reid, Thermopolis, Wyo., at \$1,322; Nowell-Atherby Co., Basin, Wyo., \$1,341; Sam Jensen, Lander, \$1,600.

BRIDGES

Notes Arranged Alphabetically by States.

Idaho, Pocatello—Bids received by Wyoming-Idaho South-Fork of Snake River Bridge commission, at office of Theo. Turner, 12 m., Dec. 20, for all labor and material for a steel highway bridge, less piers and abutments, which are already in place across South Fork of Snake river on the state line; plans at office of state engineer, Cheyenne, Wyo.

Iowa, Bloomfield—Board of supervisors of Davis county resolved to construct a steel, concrete bridge in Grove township 201-foot span, 16-foot roadway. O. S. Reed, county auditor.

Iowa, Charles City—Board of supervisors of Floyd county resolved to construct following bridges and culverts: bridge No. 18, one-half mile north of Carrville, 26-95-15, concrete through girder, 18-foot roadway, depth of fill 2 5feet, 35-foot span; cost \$2,100; bridge No. 19, 25-97-16 (McFarland bridge) concrete, 30-foot span, 18-foot roadway, cost \$2,000; bridge No. 20, near Roseville, 35-95-17, 25-foot span, 18-foot roadway; cost \$3,600; bridge No. 21, 13-96-17, 30-foot span, 18-foot roadway, cost \$2,000; objections Jan. 6; H. B. Rosenkrans, county auditor.

Iowa, Clinton—Bids received by F. G. Hansen, county auditor, 2 p. m., Dec. 29, for bridge lumber as follows: 14,770 lineal feet in 10 feet to 20 feet lengths, 312,253 board feet bridge timber, 19,542 board feet dimension lumber, all piling must be red cedar not less than 8 inches in diameter at small end, bridge timber No. 1, common rough full sawed fir, dimension stuff No. 1, common S. 4 S. fir or pine. Check for \$25.

Iowa, Council Bluffs—J. R. McPherson, chairman of Bridge committee appointed by West Council Bluffs Commercial club to secure construction of free bridge between here and Omaha proposes a bond issue.

Iowa, Eldora—Plans for steel viaduct over the Iowa here have been approved by the state highway commission, 960 feet long, cost \$38,000.

Iowa, Keokuk—A combination bridge across the river to connect this city and Hamilton, Ill., is certain to be built next year. Representative Chas. A. Kennedy will, bring a committee here from Washington to view site. The Inter-City Bridge are ready to build same as soon as congress grants the right.

Iowa, Lyons—Plans and specifications for concrete bridges here filed and bids will be opened by council Jan. 13. Bridges to be built at Old Main and Ottawa sts., and at Exchange and Fountain sts.

Minn., Center City—Plans under way for bridge across South lake project backed by local business men.

Minn., Hibbing—If Great Northern railroad does not construct a viaduct over its cut on St. Louis av. in Alice, village council will take steps for building same. H. D. Haley, recorder.

Minn., Luverne—Bids received by Wm. Stelling, chairman board of Lound township, until Jan. 5, 2. p. m., for construction of concrete abutment and beam span, clear span 34 feet, 18-foot roadway across Mound Creek. Check for 5 per cent.

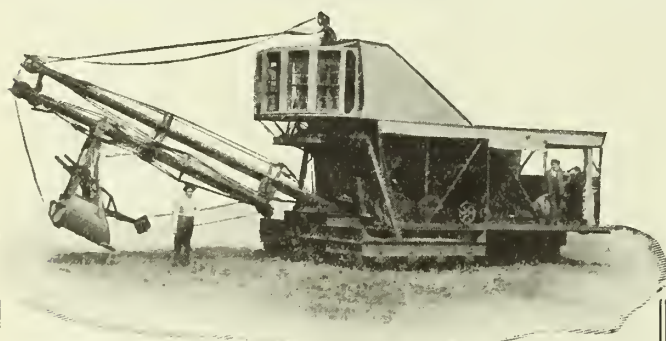
Minn., Minneapolis—Declaring that all viaducts crossing railroad tracks on streets leading to North side are unsafe. North Side Commercial club petitioned council to make necessary repairs; viaducts over M. & St. L. and G. N. tracks on 4th st., were especially mentioned.

Minn., Spooner—Frank Nutter of Minneapolis, was appointed by county board to supervise construction of bridge across the Rapid, near Hlay Creek.

Minn., St. Paul—Dayton's Bluff Commercial club has appointed a committee to formulate plans for the proposed concrete bridge over the ravine between Dayton's Bluff and the city proper. John A. Seeger, president.

Minn., Zumbrota—County board decided to do its own installing of culverts and small bridges this year. K. R. Seiler, Red Wing, county road superintendent.

Mont., Big Timber—Petition for bridge across Yellowstone, \$5,000 subscribed by W. D. Ellis, is being circulated by Mrs. J. A. Magelssen.



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THE MOST PRACTICAL MACHINE FOR DIGGING IRRIGATION OR DRAINAGE DITCHES

Travels under own power on three large caterpillars having 100 square feet of bearing surface on the soil.

Weight per square foot on the ground is 23 per cent less than the weight under the average man's foot.

Will sustain its weight in the softest marshes, turn a right angle, go forward or back, climb a 25 per cent grade, load on car with own power, and is not too wide to cross country highway bridges.

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4-Cylinder Engine	24 Foot Boom
Caterpillar Tractors	1 Yard Dipper
Stump Puller	
-:- Electric Light with Auxiliary Engine	-:-

Two Machines Ready For Immediate Delivery
If this is interesting write to us for further particulars

DIX MACHINE CO., Stillwater, Minn.

Mont., Livingston—County Commissioners are planning to divert Yellowstone River at Springdale to save a valuable bridge across the river; a wing dam will be constructed above said bridge. Cost \$4,000. The Springdale bridge connects Hunter's Hot Springs and Livingston.

N. D., Fessenden—County commissioners condemned Gross bridge, James river.

N. D., Forman—Bids received by C. E. Fouts, county auditor, 2 p. m., Jan. 6, for all culverts to be used in 1914. Bids to be on 24, 36, 48 and 60-inch culverts.

N. D., Hettinger—Bids received by Walter Kelly, county auditor, 11 a. m., Jan. 5, for two steel bridges, across the Cedar River, one at Waage Crossing and the other north of Petrel.

S. D., Aberdeen—Bids received by J. J. Roberts, county auditor, 10 a. m., Jan. 6, for construction of 80-foot bridge across Elm river, 60-foot span across James river, section line between section 2 and 3, township 125, range 62, tear down Bur-tween seccion 2 and 3, township 125, range 62, tear down Bur-ton bridge between section 14 and 23, township 123, range 65, 80-foot span to replace bridge No. 4, across James river, be-tween section 14 and 23, township 123, range 62, 40-foot span across Mud Creek, between section 4 and 5, township 121, range, 61; separate bids on each bridge; check for 10 per cent.

S. D., Gann Valley—Bids received by W. H. Abernath, county auditor, 12 m., Jan. 6, for construction of all bridges and repairs for next year.

S. D., Highmore—Bids received by C. W. Trent, county auditor, 1 p. m., Jan. 7, for construction of all steel bridges for county next year; check for \$150.

S. D., Howard—It was voted by county commissioners to build all bridges in county hereafter of concrete and steel.

S. D., Plankinton—Mike Gales was awarded annual bridge contract by the county board.

Wis., Beloit—Plans are under way to petition council for a bridge over Rock River at Public av. B. E. Wood, city clerk.

Wis., Chippewa Falls—Contract let to Vulcan Manufac-turing Co., Fond du Lac, to erect 80-foot bridge over Paint Creek at \$35,858; work to begin soon.

Wis., Chippewa Falls—Bids received by board of public works, J. R. Murphy, 2 p. m., Jan. 5, at office of city clerk, L. J. Felix, for all material and labor and piers, abutment walls, steel plate girder, highway bridge 140 feet, in two spans 70 feet each, 32-foot roadway, 8-foot walk, reinforced concrete floor on roadway, 6 inches thick, floor of walk 4 inches thick, across Duncan Creek on Jefferson av. Bids must also include taking apart and removing old bridge on site, and to con-struct same across Duncan creek on River st.; check for 5 per cent.

Wis., La Crosse—Contract for bridge on the Rubber Mills road awarded to Western Construction Co., concrete; cost \$1,200.

Wis., Milwaukee—Appropriation of \$90,000 for bridge over Kinnickinnic was stricken out of the 1914 budget and a cheaper bridge will be built; cost \$2,500.

CONTRACTS AWARDED.

Iowa, Des Moines—Contract for 3-span reinforced concrete bridge awarded to King Construction Co., Des Moines.

N. D., Hillsboro—Jardine & Anderson awarded contract for new bridges to span Roseville drain.

S. D., Bonesteel—Standard Bridge Co., Omaha, received contract for building county bridges next year.

S. D., Estelline—Sioux Falls Metal Culvert Co. was awarded contract for metal culverts for the next year. Iowa Bridge Co., got contract for bridges.

Wis., Eau Claire—Cleary-White Construction Co., Chicago, will begin work in a few days on Water st. bridge.

Wis., New London—R. S. Jennings has contract for filling approaches to the new bridge.

DRAINAGE AND IRRIGATION

Notes Arranged Alphabetically by States.

Ill., Quincy—Missouri land owners who have farms in the Marion county drainage district, at Palmyra, Mo., raised \$68,456.95 for the drainage of their property, and of that amount \$45,862.31 has been paid in cash and \$22,594.64 was allowed for the right of way and for labor in building levees. Edmund T. Perkins of Chicago, engineer in charge of the Marion county drainage district improvements and also president of the National Drainage congress of Chicago, reported Interest-

Iowa, Burlington—Harman Engineering Co. in charge of new drainage ditch in Henderson county will use sand and dirt from canal to make elevated roadway.

Iowa, Garner—Bids received until 1 p. m., Jan. 2, for county drain 33, 1,500 feet 10-inch tile, 2,300 feet 8-inch tile; first quality, salt glazed vitrified clay tile; to be completed not later than June 30, 1914; W. L. Fitkin, auditor.

Iowa, Logan—Petition filed by Oscar Doty, for extension of Fensler ditch, survey by J. H. Mayne, engineer.

Iowa, Onawa—Bids received until noon, Jan. 2, for con-struction and improvements, district 16, J. P. Olander, audi-tor, Monona county.

Iowa, Red Oak—Shortening Nishnabotna river, between Shenandoah and Riverton will cost about \$100,000 survey being made.

Iowa, Webster City—Petition for joint drainage district by Lewis E. Braland and others in Hamilton and Story counties on file. The board appointed J. W. Lee as commissioner from Hamilton county to act on said petition. A. J. Peterson, county auditor and clerk. N. H. Bawden, chairman board of supervisors.

Iowa, Woden—Hearing Jan. 7, Woden, on proposed joint drainage district 44, Winnebago and Hancock county; C. K. Nelson, auditor, Winnebago county.

Minn., Ada—At a meeting in the interest of proposed judi-cial ditch, M. A. Braland, was chosen attorney for peti-tioners, and G. L. Short appointed on committee; \$100,000 suggested as limit of expense on the improvement.

Minn., Crookston—Bids received until 10 a. m., Dec. 29, for digging and constructing Polk county ditch 89; 72,500 yards excavation, estimated cost \$10,163; leveling 5 miles road at \$375, and clearing 4 miles right-of-way at \$600, no bid accepted exceeding estimated cost more than 30 per cent; H. J. Welte, county auditor.

Minn., Fairmont—Cost of judicial ditch 29 near Ceylon, in-cluding \$700 damages, estimated at \$4,000, bids received Dec. 30.

Minn., Jackson—First hearing Jan. 12, on proposed judicial ditch A. M. Schroeder, clerk district court.

Minn., Red Lake Falls—Order establishing proposed judi-cial ditch 60 expected to follow soon after report by Geo. Ralph, engineer, St. Paul.

Mont., Roundup—Report of Engineer B. C. Lillis, Mussel-shell irrigation district estimated first cost \$10.85 an acre or \$208,139 for 19,177 acres; proposed ditch ten miles, 12-foot wide; cost \$143,487; 600-foot tunnel.

Neb., Cozaad—South Side Irrigation Co. incorporated, capi-tal \$20,000; Joseph Zook, Robert Atchison and T. A. Rowe.

Neb., Falls City—J. E. Whistler, Speiser township, is in-terested in forming new drainage district, South Fork Nem-aha river.

Neb., Holdredge—Tri-County Supplementary Water asso-ciation organized by sub-irrigation committees, from Gosper, Phelps and Kearney counties; C. W. McConaught of Hold-redge, president; H. E. Erickson, Holdredge, secretary. Dele-gation will take petition to Washington for government aid on survey.

Neb., Kimball—Lodge Pole Irrigation Co., organized, capi-tal \$250,000, to place under irrigation Bennet Live Stock Ranch, 5,000 acres.

Neb., Loup City—Austin Irrigation Ditch Co., organized; capital, \$10,000; W. S. and R. C. Fletcher, R. E. Gilmour and others.

Neb., Syracuse—Surveying complete for drainage ditch in this district, by Messrs. Shannon and Schwaderer, Nebraska City; stream proper will now be measured.

Neb., Tekamah—Drainage district will be organized for Burt and Washington counties; talk given by Mr. Toll, engi-neer, Omaha.

Neb., Wayne—Surveyors of drainage district planned at Wakefield are preparing basis for bids on eleven miles of ditch, work to be in in spring.

S. D., Colome—A large reservoir will be built by Charles Goslin of Springview, to irrigate 260 acres of land.

Wash., Olympia—Gov. Lister has appointed E. McCulloh, who has been project engineer for Sunnyside project, as engi-neer to make survey for Palouse irrigation project.

Wis., Cumberland—Wisconsin drainage Co., Elkhorn, Wis., bid \$2,800 for drainage ditch work.

CONTRACTS AWARDED.

Iowa, Bellevue—Contract awarded Croston and Welch, at \$72,000 for dams at Bellevue, Dubuque, Waupeton, Eagle Point and Guttenberg as soon as river freezes; material being secured.

Iowa, Webster City—Contract awarded R. C. Calvig, for Classon drainage ditch; Anfin-Mortvedt ditch awarded to Fardal Bros.

Minn., St. Peter—Contract awarded tile dlch 53, to North Star Concrete Co., \$2,895; C. O. Anderson and Martin Sandeen, Mason City clay, \$3,790; cement tile \$3,490; Gerhard Zerwas, \$3,144 and \$3,158; North Star bid was for cement.

WATER WORKS

Notes Arranged Alphabetically by States.

Ark., Fort Smith—Bonds for \$70,000 have been voted by the Van Buren Water Co. for extensive improvements.

B. C., Oak Bay—Construction of water system to cost \$35,000 under consideration; F. W. Clayton, clerk.

B. C., Victoria—Council will lay the riveted steel pipe line by day labor, estimated cost \$450,000. C. H. Rust, city engineer.

Iowa, Clinton—New water plant contemplated here.

Iowa, Garner—Pumping station burned; loss \$2,000.

Iowa, Muscatine—Bids received by supervisors of Muscatine and Louisa counties at office of county auditor, Muscatine, Dec. 30, for steam driven drainage pumping plant complete, to have three centrifugal pumps. The Harman Engineering Co., Peoria, Ill., engineers.

Minn., Alexandria—Council engaged J. F. Druar, consulting engineer, Oscar Claussen Engineering Co., St. Paul, to investigate water supply and make suggestions for improvement.

Minn., Carlton—E. W. Van Acken was awarded contract for drilling a 7-inch well for city; A. H. Lee, recorder.

Minn., Mesaba—Bids will be taken in spring for construction of water system.

Minn., Wabasha—Bids received by J. M. Schouweiler, city recorder, 8 p. m., Jan. 27, for construction of 6,480 feet pipe line, 12-inch cast iron bell and spigot top, 792 of 10-inch, 4,836 8-inch, 6,204 6-inch and 27 fire hydrants, valves and specials, etc., alternate bid will be taken on an equal amount of 10-inch cast iron pipe in place of the 12-inch given above, furnishing and installing a re-inforced concrete reservoir 500,000-gallons capacity, building and installation complete of a concrete curved well, 40x8; installing a 400-gallon capacity triplex power pump with motor, complete with all accessories. Check for \$200. J. R. Druar, Oscar Claussen Engineering Co., St. Paul, consulting engineer; plans on file at engineer's office, a set may be obtained for \$5.

Mont., Columbus—Bids received by Geo. A. Westover, town clerk, 8 p. m., Jan. 12, for construction of water system, estimated cost \$25,000.

Neb., Long Pine—Election held to vote bonds for extension of water mains and new stand pipe; cost \$5,000.

Neb., Mead—Bruce & Standeven, Omaha, have been employed as engineers, for the installation of a water and electric light plant.

Neb., Morrill—Bonds for \$15,000 were voted for a water works system.

Neb., Nelson—Water works are being agitated; E. A. D. Parker, engineer, surveying between town and Wells Springs. Election will be held to vote bonds.

Neb., Oakland—A new well is contemplated; write Hans Hanson.

Neb., University Place—City officers considering sinking a 10-inch well; cost \$1,100.

N. D., Warwick—The Utilities Co., Devils Lake, will install a water works system here.

Ore., Orenco—Construction of water works contemplated. Write president of council.

S. D., Eureka—F. G. Schaefer is calling for bids for sinking a city well.

S. D., Huron—Vote Jan. 20, on \$22,000 bonds for constructing and installing and equipping a mechanical gravity filter plant. S. S. Oviatt, city auditor.

S. D., Sioux Falls—Bids received 9 a. m., Dec. 22, by W. C. Leyse, city clerk, for construction of all water connections on Phillips av., from 7th to 12th st. Check for \$25. S. B. Howe, city engineer.

S. D., Yankton—Water works bonds for \$60,000 are being advertised; J. W. Summers, city auditor.

Wis., Menomonie—Council voted to appropriate \$1,400 for reservoir cover and general village purposes. H. L. Swan, clerk.

Wis., Oconomowoc—Bids received by C. H. Schoenike, city clerk, 4 p. m., Jan. 6, for fire well; write F. W. Moldenahuer, chairman.

CONTRACTS AWARDED.

Minn., Eveleth—Contract for pump house let to Lawrence McCann; cost \$10,000; work to begin at once.

Neb., Elgin—The Alamo Construction Co., Omaha, awarded contract for water works extension.

Wash., Centralia—Contract for water works system awarded to W. H. Mitchell, Seattle, cost \$124,758. His bid was lower than the estimate of city engineer, Stanley MacComber. Work to begin Jan. 1.

Wash., Seattle—Contract for water main on 20th av. N. E. awarded to Wm. Kopt, local contractor; cost \$8,584. A. H. Dimock, city engineer, has prepared plans for water mains on Alki av., estimated cost \$31,000.

PUBLIC BUILDINGS

Notes Arranged Alphabetically by States.

***Alta., Calgary**—A by-law may be submitted to the rate payers, voting \$360,000 to be given to exhibition for construction of race track, building stables, putting in water and sewer accommodations and grading and leveling work.

Ark., Heber Springs—Cleburne has again begun advertising for bids on a modern court house for Cleburne county; contract was awarded to Falls City Construction Co., of Louisville, Ky., last spring at \$49,625, but the firm later refused to go ahead on the ground that their bid had been too low, and that it would require \$75,000 to finish the building in accordance with the architect's plans.

Colo., Grand Junction—City commissioners decided to build combined fire house and police station, work to be done next spring.

Iowa, Boone—Revised plans for the court house are in progress by the Falls City Construction Co., Louisville, Ky.; O. O. Smith, construction and supervising architect, Des Moines; bids to be asked for later.

Iowa, Monticello—Council has employed M. Tschirgi of Cedar Rapids to act as city engineer while paving is being put in.

Kan., Horton—Bonds authorized for \$15,000 city hall; plans drawn and contracts to be let at once; address the mayor.

Minn., Brainerd—Council authorized special election Jan. 6 to vote on bond issue of \$75,000 for city hall; address city clerk.

Minn., Carlton—Bids recently rejected for county jail, and for which new bids have been asked to be in by Jan. 6, were as follows on the general contract: J. J. Colburn, \$18,839.00; Frank L. Redfield, \$18,416.00; Johnson Construction & Engineering Co., \$19,160.00; Joseph Bodway, \$19,784.00; Rodgers & McLean, \$14,487.00; Jacobson Bros., \$16,990.00. August R. Norman is county auditor.

Miss., Clarksdale—Bids received by O. Wenderoth, supervising architect, Washington, D. C., until 3 p. m., Jan. 27, for construction complete of U. S. postoffice; three story and basement building; ground area 5,200 square feet; first floor fireproof; stone and brick facing; composition roof.

Mo., Carthage—Petition filed for vote on proposition to build \$75,000 county farm house for Jasper county; address clerk county court.

Mo., Columbia—Bids received by J. G. Babb, secretary of state university, until noon, Jan. 5, for library building on grounds of state university; \$50 deposit for each set of plans and specifications, remitted if bid is made, \$10 retained if not; James P. Jamieson, architect, 800 security building, St. Louis, Mo.

Mont., Bozeman—Preliminary plans made for \$75,000 post-office building here and supervising architect expects to call for bids some time next summer.

Neb., Shelton—Authorities talking of a city jail; address the clerk.

Neb., Thurston—A 2-story cement block building containing a jail and accommodations for public and official meetings will be built here by the city; inquiry will be made as to details and cost; address city clerk.

N. D., Forman—Repairs are being made on the county jail; D. K. McPherson, county auditor.

Ohio., Bellaire—Bids received by O. Wenderoth, supervising architect, Washington, D. C., until 3 p. m., Jan. 19, for U. S. postoffice complete.

Okla., Atoka—Bonds have been voted for city hall building; address the mayor.

Sask., Humboldt—A new court house and land titles office building will be built in the spring; cost to be \$150,000. Building in the town for 1913 totals \$392,000.

Texas, El Paso—Election in El Paso county, Jan. 7, to vote on issue of \$360,000 in bonds for joint municipal and county court house; A. S. Eylar, judge. City has already passed on proposition favorably.

Va., Bedford City—Bids received by O. Wenderoth, supervising architect, Washington, D. C., until 3 p. m., Jan. 26, for U. S. postoffice building.

Wash., Seattle—It is expected work on the \$1,000,000 court house will begin in the spring, as the bonds will be taken by Chicago interests.

Wash., Seattle—Plan is being discussed of building joint court house and city hall; total cost to be about \$1,600,000; David McKenzie, chairman, county board.

Wis., Ashland—County board will ask for competitive plans for court house to cost from \$110,000 to \$130,000, three prizes to be given, \$350, \$250 and \$150, these to be delivered to the board by Jan. 25. Court house to have no tower or dome and jail not to be part of the building; Carl Rudquist, chairman county board.

Wis., Sheboygan—Plans completed by H. W. Buemming, architect, 521 Jackson st., Milwaukee, for \$150,000 city hall, 3-story and basement; architect and city will take bids soon; F. C. Haack, chairman committee.

CONTRACTS AWARDED.

Ia., Rigby—Contract with S. S. Later for building to be used as a court house for newly formed county of Jefferson.

Ill., Edwardsville—Contract for U. S. postoffice here to Volney E. Taylor, Huntington, W. Va., at \$52,200.

Iowa, Perry—Contract has been awarded to Wm. O'Neil & Son, Faribault, Minn., for the federal building here at \$59,159. Work must be completed by April 15, 1915. At the time of the bidding the figure given out was \$50,159 as the bid of this firm.

Mont., Dillon—Contract to P. P. Vreeland of Fred F. Wilson & Co., Bozeman, for plans for city hall building; 50x100, 2-story and basement, expect to begin foundation in February.

Neb., Lincoln—Contract to Geo. A. Wilson for interior remodeling of postoffice, being lowest of four bidders.

Utah, Price—Contract for Carnegie library to Lars Gunder-son, city, at \$11,500; 1-story, basement, 35x70.

Wis., Elk Horn—Contract has been made with Van Ryn & DeGelleke, architects, Milwaukee, Wis., for plans for the proposed new jail, to be drawn soon as possible and submitted to state board of control for approval.

Wis., Two Rivers—Contract with Frank L. Wolfe for the Carnegie library here.

Wyo., Wheatland—Contract to Baerreson Bros., Denver, Col., architects, for plans and specifications for \$40,000 court house; there were five other contestants.

ELECTRICAL

Notes Arranged Alphabetically by States.

Iowa, Cedar Rapids—Additional street lights will be installed and all electric wires will be placed under ground after Jan. 1.

Iowa, Cedar Rapids—It is proposed to construct a dam to cost \$125,000. The Iowa Railway & Light Co. will erect power house, house and equipment to cost \$100,000. T. F. McCauley, city engineer.

Iowa, Coin—Farmers near Bingham asked Coin Electric Co. to extend light to Bingham.

Iowa, Dennison—City Council considering purchasing light plant. Write T. V. Walker.

Iowa, Fort Dodge—Central Iowa Light & Power Co. will take over the plant of the Fort Dodge Street Railway Co., and transmission lines between Des Moines, Ames, Boone, Ft. Dodge and Rockwell City, and will reorganize and repair.

Iowa, Maquoketa—The power house is being repaired, new boilers engines and dynamos are being installed and 140-foot steel tank is being erected, a marble switchboard has been ordered and another pump to cost \$1,000. Total cost of improvements \$30,000.

Iowa, Pilot Mound—It was voted to have electric lights.

Iowa, Shelby—Franchise granted Avoca Electric Light & Power Co.

Iowa, Storm Lake—A building will be erected by Northern Telephone Co.

Minn., Aurora—E. B. Jackson, consulting engineer, St. Paul, has been engaged by council to estimate cost of construction of a modern electric light plant, operated by steam power, or to buy electricity.

Minn., Dassel—A movement is on foot among the farmers near here to secure electric light and power to operate machinery on their farms the farmers to pay expense of building pole line and the local company to do the work and wiring. Miles Sisson, Peter Stone, interested.

Minn., Duluth—West End Commercial is planning a white way from 18th and 22d av. west on Superior st. L. A. Simonson, president.

Minn., Floodwood—Commercial club, M. W. Hingeley, president, is investigating cost of a municipally owned electric lighting system.

Minn., International Falls—Council considering electric light plant for city lights; R. C. Fraser, city clerk.

Minn., Mankato—County engineering department have finished outside work for proposed electric line to St. Clair, and making plats of the Thompson ravine route.

Minn., Monticello—Jacob and Theo Kautt, St. Paul, have incorporated as Monticello Electric Light & Power Co., and will furnish electric light for the town.

Minn., Morton—Sufficient stock has been subscribed to bring the Luce Electric line through here. F. W. Orth, interested.

Minn., Parkers Prairie—Electric light system will be installed here by Pelican Rapids parties.

Minn., Park Rapids—Commercial club voted to pledge financial assistance to building any line of railroad for more electric railway having headquarters here; also the issuing of village bonds for building, for \$10,000.

Minn., St. Cloud—Negotiations commenced by Minnesota Union Electric Co., T. A. Chadwick, superintendent, for a new electric line from here to Minneapolis, to run between the Soo and Great Northern lines.

Minn., Stillwater—Agitation has started for better lighting system.

Minn., St. Paul—Northwestern Telephone Co. has begun erection of Robie Exchange, Goff and Dearborn sts., cost \$180,000, completed April 1.

Minn., Virginia—Mesaba Railway Co. will not erect car barns until spring, a temporary frame building is being constructed. H. S. Newton, local manager.

Minn., Wayzata—E. H. Reynolds has purchased the system of Hennepin Telephone Co.

Minn., Zumbrota—Commercial club has taken up the proposition of electric lights for business streets.

Mont., Anaconda—Work will begin early in spring on the electrification of 440 miles of the Milwaukee road and electric motors will be running on the line between Deer Lodge and Three Forks by Dec. 1, 1914.

Mont., Billings—Montana Power Co., Max Hebgen, first vice president and general manager, will erect a 2-story brick and concrete, 40x150, and the Billings branch will occupy first floor, second will be fitted up for offices.

Mont., Helena—Sub-committee of Commercial Club, who have been going over route for interurban to Hauser Lake suggest a direct line from here to the east arm of Hauser Lake via the cemetery, 13 miles, estimated cost per mile \$9,162, exclusive of cost right of way, grading, bridges or culverts, rolling stock to consist of two motor cars, and two trail cars; cost \$30,000. Actual work to begin in spring. Frank J. Edwards, chairman.

Mont., Wilsall—A stock company bought the local telephone system from the Bell Co., and a switchboard will be installed here and a telephone exchange. A copper toll circuit will be built to Livingston.

Neb., Curtiss—Local telephone office burned. Will be replaced by brick building.

N. D., Bremen—C. W. Saylor was given permission by the county board to construct a telephone system here.

N. D., Cando—Commercial club interested in a white way lighting system for business streets.

N. D., Warwick—Utilities Co., Devils Lake, F. E. Corson, Fargo, president, will establish a light power and heating plant here.

S. D., Dell Rapids—Special election held on franchise to N. C. Draper, Sioux Falls. He proposes power plant at Baltic and a transmission line to this place.

S. D., Gregory—The electric light plant was burned causing causing a loss of \$1,200.

S. D., Hendricks—The Deuel Telephone Co. has been granted a franchise.

S. D., Sherman—A. K. Hanson sold the electric light plant and telephone exchange to Mr. Vining; John Winckler will have charge.

Wash., Big Stone—A company has been formed, I. D. Aldrich, president, for the purpose of building an electric light plant. Work to begin at once.

Wash., Leavenworth—Pacific Telephone Co., will build an addition copper circuit between Ole Elum and Blewett; cost \$8,000.

Wash., Seattle—Superintendent of Lighting J. D. Ross recommended to council development of Lake Cushman power site, development of Cedar Lake power plant by construction of a masonry dam and construction of a steam auxiliary plant, estimated cost \$4,000,000.

Wis., Antigo—Wisconsin Telephone Co. is building a line to give direct connection between Rhinelander and Merrill.

Wis., Burkhardt—Jacobson & Ackerman, engineers, Grand Rapids, Wis., and Minneapolis, have signed contract with Burkhardt Milling & Electric Co. for a dam 60 feet high, pipe line and power house at Willow River Falls. Construction to begin in spring.

Wis., Hudson—Bids received by E. E. Denniston, city clerk, Dec. 26, for lighting the city and pumping water for 5 years.

Wis., Milwaukee—Milwaukee Realty & Securities Co., organized here to do the preliminary work for an extension of the Milwaukee Western Electric Railway from Fox Lake to Green Lake and from Beaver Dam to Madison, length 74 miles, construction work to begin in spring. W. W. White and others.

Wis., Milwaukee—Consulting Engineer A. J. Sweet recommends that city buy all new street lamps installed and city ownership of lamps and poles.

Wis., Milwaukee—Milwaukee Realty & Securities Co. has been organized to do preliminary work on an extension of the Milwaukee Western Electric railway from Fox Lake to

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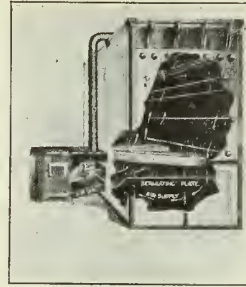
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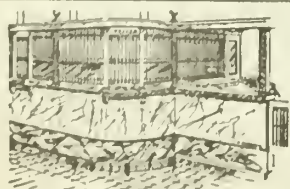
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Green Lake and from Beaver Dam to Madison, 74 miles, work to begin early in spring. A. P. Kletsch, J. W. Barber and others.

Wis., New London—Mr. Kirschofer, consulting engineer, Madison, recommends two engines and two generators to replace present equipment at power house.

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

Ariz., Bisbee—A. H. Reeves, Phoenix will build a theater here.

Ariz., Lowell—Order of Owls have broken ground for new lodge home; 40x100.

Ark., Harrison—Lyric Theater Co. will remodel building at cost of \$8,000.

Ida., Sandpoint—Bids will be asked for at once for lodge building for Helmet lodge, K. of P.; 2-story, entirely modern; bids on both cement blocks and face brick.

Ill., Decatur—Architect has not been selected for remodeling of coliseum, to cost \$20,000; address W. Evans, secretary Chamber of Commerce.

Iowa, Davenport—Masonic Temple damaged by fire and smoke to the amount of \$15,000.

Iowa, Des Moines—Za-Ga-Zig temple of the Mystic Shrine are figuring on building a temple to cost \$100,000.

Iowa, Grundy Center—Bids are being advertised for by C. H. Johnston for an opera house, two stories and basement; 40x80, pressed brick veneer, hollow tile wall.

Iowa, Harlan—John Thelen will build a dancing hall, 58x64.

Iowa, Missouri Valley—Benevolent Order of Beavers will erect a \$20,000 building for lodge and club purposes; address committee on building, recently appointed.

Iowa, Muscatine—German Home Society expects to build during 1914; Herman Gensing, secretary.

Iowa, Red Oak—Odd Fellows will spend \$2,000 on improvements on their hall; lodge room will be redecorated with art ceiling, burlap and new decorations for side walls, and full stage will be added; F. W. Barnes, financial secretary.

Iowa, Sioux City—Preliminary steps taken by York Rite Masons for Masonic home; committee chosen to procure plans, estimate cost and make report.

Iowa, Sioux City—Preliminary plans submitted for club house for Auto & Speedway association, S. C. Douglas, president, 4604 Morningside av.; will build in spring.

Minn., Albert Lea—Citizens discussing a \$50,000 Y. M. C. A. building; A. E. Carlsen, secretary Y. M. C. A.

Minn., Browns Valley—Ed. Pallansche is considering building an opera house.

Minn., Swanville—A large club house is contemplated by St. Paul people two miles west of here on Pillsbury lake.

Mo., Carthage—Business Men's League behind movement to build \$20,000 convention hall; committee appointed to confer with architects.

Mo., Ellisberry—Plans in progress by J. M. Dunham, architect, Chemical building, St. Louis, Mo., for remodeling of opera house; Elsberry Opera House Co., owner.

Mo., Kansas City—The Kansas City club, Victor W. Flowere, treasurer, Dwight building, contemplates building a \$400,000 club house; 50x142, 8-story and basement.

Mo., Springfield—Odd Fellows are considering building a lodge home; T. K. Bowman, financial secretary.

Neb., Beatrice—The Eagles' Building association contemplates building a club house; 2 and 3-story and basement, \$25,000 to \$35,000.

N. M., Albuquerque—Joseph Barnett will build \$50,000 theater and airdome.

N. D., Colgan—A public hall will be built; address the mayor.

N. D., Rhame—Odd Fellows will build auditorium to cost \$4,000; 36x70.

Ore., Ashland—Al. D. Helms will erect opera house.

Ore., Baker—Socialists will build 2-story brick to cost \$4,500; plans by M. P. White, architect.

Ore., Portland—T. J. Noonan, Chicago, Ill., preparing to erect theater here to cost \$450,000; E. J. Condon, local representative.

S. D., Humboldt—Work started on new opera house to be erected by F. J. Wise, city; brick, steam heat and modern.

Wash., Seattle—Permit has been issued for moving picture theater to cost \$4,000; H. A. Jones, owner.

Wis., Appleton—Plans for the Y. M. C. A. building will be prepared by Shattuck & Hussey, Chicago; to be of native stone, upper story of stucco; cost \$85,000, complete, including furnishings; 72x108, 3-story and basement, gymnasium, 24 bed rooms on 3d floor, swimming pool, etc.

Wis., Chippewa Falls—Catholic societies propose erecting Catholic Y. M. C. A. building, endorsed by clergy; address J. B. Piotrowski for information.

Wis., Marquette—Steps taken to enlarge Cheney hall, \$25,000 to be expended; Lenhouts & Guthrie, architects, Milwaukee, Wis.

Wis., Waukesha—Order of Elks proposed building in near future; will have bowling alley, pool and billiard hall, large dance and lodge hall; C. A. Haertel, chairman of committee on site.

CONTRACTS AWARDED.

Iowa, Clinton—Contract as announced last week went to E. Krieger for general work on the armory and coliseum, and large force has already begun preparing the site. Clinton Bridge Works, steel; C. E. Armstrong Co., heating; Geo. Kendall Co., plumbing; E. W. Thompson, painting; Calhan Electric Co., electric work; all of Clinton, Iowa.

Iowa, Mason City—Contractor C. E. Atkinson, Forest City, Iowa, is rushing the completion of the Johansen theater, to be used mostly for moving pictures; seating capacity about 900.

Ont., Port Arthur—Contract to Seaman & Penniman for the new theater on Arthur st.

Wash., Seattle—Contract to H. Parish, city, for a moving picture theater to be built by S. Danz, 211 Occidental, to cost \$3,000; Saunders & Lawton, architects.

HOTELS AND HOSPITALS

Notes Arranged Alphabetically by States.

Alta., Calgary—Bids will be called for early in the spring for a hospital; plans being drawn; J. M. Miller, city clerk.

Alta., Edmonton—Fire destroyed hotel Fitzhugh; may be rebuilt shortly.

Iowa, Calmar—Bids recently in on the 3-story and basement apartment hotel being built here by Thomas M. Pierce, Dubuque, Iowa; cost \$20,000.

Iowa, Decorah—Plans submitted for modern city hospital; press brick, Bedford stone trim, electric elevator, steam heat, etc.; address city clerk.

Iowa, Montrose—John Reimbold, Nauvoo, Ill., offers to build hotel to cost \$5,000 or \$6,000 if site is furnished; modern.

Iowa, Pocahontas—Stock company, \$25,000 capital, organized to build hotel to replace burned building last March; address Geo. Schneiders.

Kan., Wichita—Plans have been completed for the hotel to be built here by the Travelers' Hotel Co.; 100x140, 5-story and basement; cost, \$400,000; Richards, McCarty & Bulford, architects, Columbus, O., will advertise for bids at Wichita; address A. O. Boyle, Wichita.

Man., St. Boniface—Bids to be called for early in 1914 for 000; J. A. Senical, architect, City.

Minn., Riverton—Hotel to be built here postponed until spring; 60x100, 2-story and basement; cost \$30,000; A. W. Puck, architect, 617 Torrey building, Duluth, Minn.

Mo., Kansas City—Plans in progress by L. Grant Middaugh, Kansas City Life building; 125x164, 8-story hotel and basement; cost \$300,000; owner, F. P. Cooper, care architect.

Mont, Butte—The Leggatt & Couse hotel, nearing completion, will cost \$100,000; and is the most costly of the new buildings of the year.

Mont, Fairview—Residence building to be used as a hospital and fully equipped for that purpose; address Dr. Perkins.

Neb., Beatrice—The Union State Bank has been purchased by E. A. Meyer, Houston, Texas, who will convert it into a modern hotel.

N. D., Hillsboro—Preliminary arrangements are being made for a \$20,000 hospital here the coming year; Ole Arnegaard, chairman of committee, Hillsboro.

D., Simcoe—Hotel owned by J. H. Muus, burned; loss \$900.

***Sask., Regina**—Work on the new Grand Trunk Pacific hotel, "Qu'Appelle," here has been stopped and work will be resumed in spring.

Wis., Highcliff—M. H. Niesen of Kaukauna has purchased the 12-acre resort from Mrs. Cecilia Milner and will remodel the buildings.

Wis., Stanley—Dr. Sommerfelt has proposition on foot to build \$15,000 hospital; hopes for action in near future.

Wis., Waukesha—Plans have been completed by C. C. Anderson, architect, city, for hospital for the city; 36x36, 2-story; cost \$15,000; will receive bids about Jan. 1.

CONTRACTS AWARDED.

Ill., Rockford—Contract for hospital addition to W. H. Cook, city, wants bids on electrical work and plumbing.

Kan., Wichita—Contract to John M. Denny, 1451 N. Lawrence st., for hospital for the Wichita Hospital association; 40x118, 5-story and basement; cost \$60,000; work not started.

Minn., Chisholm—Contract to Johnson & Watne, Hibbing, for detention hospital, as announced heretofore, \$8,122; com-

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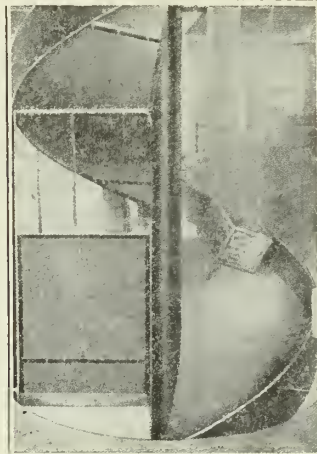
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Wash., Carlisle—Contract to Peter Granstrom, Hoquiam, Wash., for big hotel and store building here.

Wash., Norlin—Contract to Shepard & Warrack, Sedro-Wooley, for reinforced concrete kitchen and storage building for hospital for insane at \$22,770; Ben Olson, Tacoma, has contract for plumbing at \$2,785.

SCHOOLS

Notes Arranged Alphabetically by States.

Alta., Warner—\$30,000 school bonds have been voted.

B. C., Vancouver—Permit was issued for construction of manual training school in connection with General Gordon school at 6th av. and Baywater st.; cost \$2,490.

Iowa, Anita—Work has commenced on plastering of new school house.

Iowa, Blockton—Work has commenced on the site of the new school building.

Iowa, Cedar Rapids—A site has been chosen and a new school house will be erected in spring.

Iowa, Laurens—Kirby T. Snyder is preparing plans for new \$50,000 school house to be erected here.

Iowa, Maquoketa—\$20,000 school bonds were sold.

Iowa, Osage—Riceville school board are discussing issuing \$4,000 school bonds for erection of addition.

Iowa, Sioux City—At a meeting of building committee it was decided to complete west wing of high school building. F. E. Colby, architect.

Kan., Ottawa—Plans are in progress by Geo. P. Washburn & Son, architects, for gymnasium for Ottawa University; Rev. S. E. Price, president; 75x100, 2-story and basement; cost \$25,000.

***Man., Durban**—A by-law will be submitted to the ratepayers here, voting \$7,500 bonds for purchase of site for erection of school.

***Minn., Baudette**—A 12-room school house will be erected here.

Minn., Ely—School board of district No. 12 plans to issue \$125,000 bonds soon.

***Minn., Farmington**—Bids will be received Dec. 29, 8 p. m., for electrical work on the new school building; plans by Alban & Hausler, architects, St. Paul, Minn., 409 Chamber of Commerce; check for 5 per cent; H. W. Hosmer, clerk.

Minn., Good Thunder—A 2-story and basement school house will be erected, 42x56, plans by Geo. Pass & Son, Ekle building, Mankato, Minn. Plans nearly completed, owner will take bids early in spring. Dr. Theo. Schleselman, member of board.

Minn., Red Lake Falls—Fire destroyed the school house in Red Lake district No. 36, valued at \$15,000.

Minn., St. Cloud—A landscape gardener will prepare plans for grounds for the \$80,000 dormitory of the normal school; architect was instructed to prepare plans for the new building; C. H. Johnston, architect, St. Paul, Minn.

Mont., Butte—A 3-story, 200x85 school house will be built; plans in progress; bids will be received Jan. 20; H. Kemna, architect, Butte; cost \$100,000.

Neb., Chadron—Bids received until Jan. 13, 1914, for a wing to the normal school here, 3-story, brick, 50x60, cost \$30,000, fireproof, work to start next spring; steel frame and beams, tile, reinforced concrete and gypsum fireproofing, lime-cut stone, common pressed brick, hollow, steam heat, electric lights, composition roof, patent plaster, metal lath, corner bead, lead and oil paint P. & L. varnish, wired and figured glass, tile floor, marble baseboards, oak finish; plans by J. C. Stitts, architect, Norfolk, Neb.; check for \$25; J. J. Tooley, secretary school board.

Neb., Climax—Work is progressing rapidly on the Prairie Dell school house, district No. 276.

Neb., Dwight—A new school building is being erected here, cost \$16,000.

Neb., Fremont—Contract for the erection of a school building and material which is being erected under supervision of the building committee, of board of education, has been entered into with the manufacturers.

N. D., Fargo—Plans for 4-story school building to be erected by the Sacred Heart academy have been received, cost \$60,000, at Builders' and Traders' Exchange, 108x48, pressed brick construction; contract to be let Dec. 16.

Sask., Saskatoon—The Hebrews will erect a new school here. J. E. Scheartzenbine, member of Hebrew association.

S. D., Bonesteel—A \$20,000 school building will be erected here in spring.

S. D., Buffalo—A new school building is being erected at Hitchcock.

S. D., Fletcher—A new school building is being erected at Hitchcock.

S. D., Sioux Falls—Three new school houses will be erected here.

S. D., Sioux Falls—A school bond issue of between \$150,000 and \$175,000 will soon be issued.

S. D., Viborg—All bids were rejected for school house in Salem district board will buy lumber themselves; Chris Johnson, clerk.

Wash., Seattle—\$650,000 school bonds were voted Dec. 6, plans will be prepared for school building by school architect, Edgar Blair, 901 7th av.

Wash., Seattle—Bids received Dec. 27, for construction of a 2-story brick school building in district No. 51, by Frank Steil, clerk, 752 N. 89th st. V. W. Voorhees, architect, inc., Seattle, Wash.

Wis., Eagle—A \$10,000 school building is being contemplated, Charles Leibr, clerk, build in spring.

***Wis., Endeavor**—Ground has been broken for new academy building to be erected here. Alva Mills and Maurice Roller have excavating contract.

Wis., Fond du Lac—Bids for erection of new east side high school will be in Jan. 14.

Wis., Galesville—Plans ready in spring for superstructure of gymnasium and dormitory for Gale college; 36x80, 2-story and basement, \$10,000; Andrew Roth, architect, La Crosse, Wis.; address J. A. Berg, Galesville, Wis.

Wis., Mauston—Bids received Dec. 29, 4 p. m., for erection of solid stone and brick school building; check for 2 per cent. Plans on file at office of Parkinson & Dockendorff, architects, La Crosse, Wis., M. L. Bunnell, clerk.

CONTRACTS AWARDED.

Iowa, Sioux City—Contract for mill work from the addition to high school has been awarded to Curtis Sash & Door Co.

Mont., Roundup—Contract for erecting a school house in district No. 23, was let to L. D. Tucker, at \$800; other bid was W. Cameron of Melstone, at \$875.

Neb., North Platte—Contract for construction of school house at Stapleton has been let to firm of Fodges & Ibaugh of Stapleton.

S. D., Parkston—Contract has been awarded for the erection of a Catholic parochial school here, cost \$25,000.

Wash., Seattle—Contract awarded to Ernst Heating & Plumbing Co., for installation of heating, plumbing, ventilating, in school at Lake Forest Park, at \$529.

BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Edmonton—Plans being made to enlarge branch of Winnipeg Ceiling & Roofing Co., Ltd.

Alta., Retlaw—Work has commenced on the McGregor hardware store; Theo. and John Odmark, have contract.

***Alta., West Edmonton**—Fire destroyed the Walter Spinks drug store and village postoffice, \$12,000; may be rebuilt.

Iowa, Blanchard—The Copeland & Clark Co. is building a store building.

Iowa, Grinnell—Walter Hastings will erect a brick block, 60x80, modern.

Iowa, Grundy—Bids received Jan. 15, for building a 2-story brick building, C. H. Johnson.

Iowa, Knoxville—A company store is being erected at Whitebreast station.

Iowa, Mailey—Fire destroyed a block of business buildings here; loss about \$50,000.

Iowa, Marathon—Fire destroyed the general store of J. C. Hitchcock & Co., and drug store of W. Murray; total loss about \$20,000.

Iowa, Marshalltown—Store of A. G. Vandermeer was burned.

Iowa, New Hampton—Johnson Bros. have begun large warehouse.

Iowa, Panama—John Thelen is building a hall, 58x64; basement for blacksmith shop.

Iowa, Shellsbury—Shellsbury Savings Bank will erect a 2-story brick building in the spring.

Iowa, Sibley—Aug. Grohmann is building an addition to block for offices.

Iowa, Sioux City—The Lyle Construction Co. are placing roofs on two brick store buildings being erected by J. F. Helms, and Edward Gaster of Ashton, Iowa, same company is erecting a bank building.

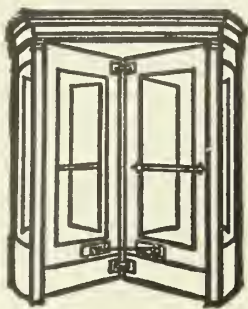
Iowa, Spencer—F. X. Maurer Co. will build a cement block building, 56x94, consisting of office, shops, implement and auto show and sales room.

Iowa, Waterloo—C. M. Berkley Hardware Co. have closed contract for builders' hardware to be used in the new Russell-Lamson hotel.

Man., Carman—Bridge & McCulloch's implement warehouse was destroyed by fire, will be rebuilt soon.

Man., Winnipeg—Winnipeg Broom Manufacturing Co., Ltd., incorporated, will build a plant soon.

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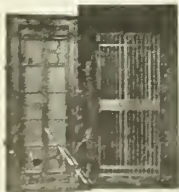
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Man., Winnipeg—Block of buildings in town of Le Pae were burned; loss about \$200,000.

Minn., Chisholm—Fire destroyed Jasper-Fjelstad Dry Goods store; loss about \$8,000.

Minn., Chisholm—Lundall & Son will erect a modern brick block; 2-story, plate glass front, 85-foot front.

Minn., Crosby—A modern business block will be erected by Wm. S. Pitt; cost about \$15,000. Vernon J. Price, architect, Duluth, Minn.

Minn., Crosby—Duluth and Minneapolis capitalists will soon start the Crosby State Bank brick building, bank and offices.

Minn., Faribault—Fire destroyed store of Mrs. Margaret Stocklein; loss \$8,000 to \$10,000.

Minn., Grasston—The Grasston Horse Co. erecting a large ice house, 60x100.

Minn., Hancock—Fire destroyed office of the F. L. Clark Land & Loan association; loss about \$10,000.

Minn., Jackson—Several new business blocks will be erected in Jackson next spring.

Minn., Montevideo—M. H. Sheehan plans to build a business building; brick, 2-story; cost \$7,000.

Minn., New Prague—Fire destroyed business block; Grandman's tailor shop, jewelry store and drug store and the Hegg shoe store.

Minn., Perham—Excavation has started on basement for Mackel's warehouse.

Minn., Rochester—Extensive alterations are under way on the Gamble-Robinson wholesale house, and the Rochester Creamer Co., building.

Minn., Rushford—Sheldahl & Howley will erect a 36x36, 2-story egg-house; M. Nelson, contractor. building, fireproof, modern, cost about \$100,000; Bateman & Switzer plan a 3-story building.

Mont., Helena—The Sand Bros. Dry Goods Co. will erect a modern store building, 2-story and basement.

Mont., Whitehall—Several large brick business buildings are being erected.

Neb., Aurora—Clarence & Melvin Cass will build a 2-story business block.

Neb., Fremont—New bank building is nearing completion.

Neb., Geneva—Bids received by Bert Lynn, county clerk, 12 m., Jan. 13, for erection of all wooden, steel and concrete bridges in county next year; check for \$500.

Neb., Gering—Work has commenced on the new pool hall for Glen Swan.

Neb., Grand Island—Otto Schwartz is building a new barber shop.

Neb., Hastings—Will Bohnet is installing a new store front in his piano and music store.

Neb., Hastings—A general store is being built by Geo. Larsen at new town of Howardville, also a blacksmith shop.

Neb., Lincoln—City engineer has prepared plans and specifications for building of Antelope Creek conduit. Plans will be submitted to council at once.

Neb., Lincoln—A. L. Shader is building a 2-story cement and brick business block, 25x142; cost \$12,000; Chancellor Avery is constructing a garage; cost \$2,000.

Mont., Livingston—Fire destroyed the First State Bank, A. W. Miles store and other buildings; loss \$150,000.

Neb., Neligh—Hans Lorenzen will build a modern brick structure, 96x130, to be occupied as a clothing store and general merchandise.

Neb., North Platte—A new office building is being erected at the experimental station.

Neb., North Platte—A new brick roundhouse will be erected.

Neb., Papillion—The Anchor Investment Co. is erecting an ice house and cold storage vault.

Neb., Pawnee City—Bids received by R. R. Mahan, county clerk, 10 a. m., Jan. 6, for repairing all bridges for ensuing year. Check for \$1,000.

Neb., Schuyler—Bids received by E. F. Vrzak, county clerk, 10 a. m., Dec. 30, for building steel, concrete and wooden bridges for year 1914; check for \$500.

Neb., Sidney—The J. A. Walford new cement block building is nearing completion; Dan Bick, contractor.

Neb., South Sioux City—Fred Gordon is building a business building.

Neb., Superior—A 50-foot store building will be erected in the spring.

Neb., Verdel—Robert Klug is erecting a cement stone store building.

Neb., Verdigre—The Local Farmers' Union Co-operative association plans to erect a warehouse soon.

Neb., York—Bids received by E. F. Chapin, county clerk, for construction of all wooden bridges to be built in 1914; check for \$500.

N. D., Grafton—E. K. Hoganson will remodel old Carruthers' building into a garage.

N. D., Granville—Gust Winterfield blacksmith shop destroyed by fire.

N. D., Lisbon—Permit granted John Muralt for sheet metal covered ice house, 20x30, 1½-story.

N. D., McVie—J. J. Arneson will build a new furniture store.

N. D., New Rockford—People's Land & Investment Co. will erect a number of business houses, apartments and flats. Hugh Peoples, I. Morrish of Fargo and Governor Hanna are interested.

N. D., Olanta—Drug store is being erected here by Dr. Claybaugh.

N. D., Velva—Fire destroyed store of H. H. Springer at Simcoe.

N. D., Wahpeton—Mrs. Hobson is building an addition to her restaurant.

Ont., Ottawa—A. E. Rae Co., Ltd., are making addition to stores; cost \$500,000.

Ont., Port Arthur—The Port Arthur Jewelry Co. and S. M. Lowery of the Bazaar are arranging to build new buildings.

Ont., Fort Arthur—The Bank of Montreal will erect a new bank building to cost \$100,000; work will commence in spring.

***Sask., Battleford**—The Merchants Bank of this city will erect a new building on corner 22d st. and 2d av.; old building is being razed.

Sask., Moose Jaw—Geo. White & Sons, Ltd., London, Ont., plan warehouse here next spring.

Sask., Moose Jaw—The Stewart Leaf Co., of Winnipeg, will erect a warehouse here soon.

Sask., Regina—Foundation in for addition to warehouse of Regina Plumbing & Heating Co., Ltd.

S. D., Armour—Work nearly completed on new structure of C. H. Raben and J. F. Anderson.

S. D., Brookings—Brookings Product Co. building delayed.

S. D., Chamberlain—The blacksmith and machine shop of Olson & Skorheim was burned; valued at \$5,000.

S. D., Howard—J. A. Holstrom will build an addition to his warehouse.

Wis., Neenah—Permit granted to William Krueger for repairs to building, galvanized iron roof; to M. Burstein, erection, brick fireproof building; also to Dick Patterson, brick fireproof addition to building.

CONTRACTS AWARDED.

Minn., Rushford—Contract awarded to M. Nelson, for erection of store building for H. Halverson, at \$3,850; other bid was Jno. Akre, at \$3,870, building to be 25x90; 1½-story, hollow brick and tile basement.

Neb., Alliance—Otto J. Hehnke has contract for erection of a retail store for the Newberry Hardware Co., cost \$40,000.

Neb., Fullerton—John Dopf has contract for erection of a new building for the Journal at Rockport, Mo.

N. D., Grand Forks—Contract awarded to E. A. Brasset, of this city for the electric wiring of the Skaren & Olson building at \$700.

MILLS AND FACTORIES

Notes Arranged Alphabetically by States.

Alta., Bow Island—A wood working factory will be erected here in spring; write Board of Trade.

Alta., Calgary—A \$150,000 plant is contemplated for Pilkington Bros. here.

B. C., Vancouver—Ocean Falls Pulp & Paper Co., plans erection of a large factory; cost about \$3,000,000; Herbert Fleishhacker of San Francisco, interested.

Iowa, Council Bluffs—A new creamery will be built by the Bloomer Ice & Cold Storage Co. soon; cost \$15,000, brick and concrete construction, 100x37, modern throughout, built for five stories. Fred F. Hurd, manager and president.

Iowa, Creston—Creston Pantorium Co. contemplates a cement block building.

Iowa, East Dubuque—A cigar factory will be established here next spring, Messrs. Albert Johnson and Andrew Ring, Dubuque, interested.

Iowa, Maxwell—Chas. McIlse is building a tile factory building.

Minn., Anoka—Daniel Ryan and associates of St. Paul, contemplate establishing a pickle factory here.

Minn., Duluth—Commissioner Merritt is considering establishing a municipal gas plant in New Duluth.

Minn., Edgerton—A new canning factory will be established here.

Minn., Groningen—The C. J. Jogland saw mill at Finlayson burned; total loss.

Minn., Hibbing—Island Creamery Co. will make improvements to their plant, making it modern and up-to-date; C. G. Hartley, owner, W. H. Becksted, manager.

Minn., Minneapolis—C. W. Lundquist Co. furniture manu-

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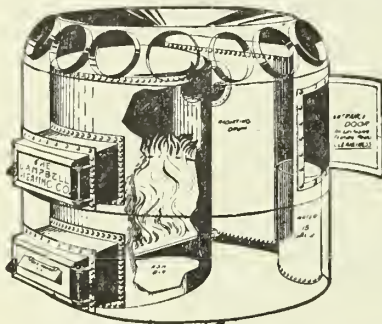
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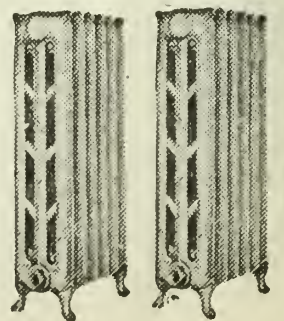
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facturers, will erect a factory at 711 15th av. NE. Cost \$22,000.

Minn., New Ulm—Contract awarded to Eagle Roller Mill Co., Minneapolis, for installation of four new boilers in the power plant.

Minn., Owatonna—The Minnesota Dairy Manufacturing Co. will erect a factory here; cost between \$75,000 and \$150,000.

Minn., St. Paul—Minnesota Mining & Manufacturing Co., Forest and Ross sts., manufacturers of sand paper, will enlarge their plant.

Minn., Walker—Work has started on the burner for the saw mill.

Minn., Willmar—The Minncapolis Boiler Co. will move to this city and erect a new factory building, 85x130; F. J. Walling, president, P. C. Peterson, vice president.

Minn., Willmar—Economy Boiler Co., from Minneapolis, will erect a factory here, 85x130; Jos. W. Rosche, mechanical manager; to be opened Mar. 15, 1914.

Minn., Winona—A tower 120 feet high is being constructed by the Interstate Packing Co., at their plant, on which large tank will be placed for an automatic sprinkler system.

Mont., Billings—A \$2,000 plant will be erected for the Ox-acetylene Welding Co., C. W. Pullen, of Pullen Bros., Minneapolis, interested.

Mont., Forsythe—Contractor Fred Eggleston has completed foundation work on the Eastern Montana Milling Co.'s plant. E. A. Richardson, president.

Mont., Forsythe—Work is progressing on big flour mill, mill to be in operation by May 1, 1914; cost \$20,000.

Mont., Helena—Plans are under way by the Caroline Gold Mining Co., for erection of a mill on its property near here. Frank J. Glenn, president, Butte.

Mont., Libby—Shevlin-Carpenter Lumber Co. will erect a large mill, capacity 75,000,000 feet a year; Fred H. Korst-korta, architect, 829 15th av. S., Minneapolis; E. H. Dea, superintendent of construction.

Neb., Omaha—The People's Ice & Cold Storage Co., 1224 Chicago st., intends erecting a cold storage and ice plant, will ask for bids at once.

Ont., Berlin—Foundation is being laid for a felt hat factory for Walter G. Rumpke.

Sask., Prince Albert—A \$120,000 factory building is contemplated by the Royal Farm Machinery Co., has been granted a site of five acres.

Sask., Regina—Foundations are in for the addition to the warehouse of the Regina Plumbing & Heating Co., Ltd.

S. D., Gregory—Fire completely destroyed the electric light plant; loss about \$12,000 to \$15,000.

S. D., Hartford—Wm. Mielke has purchased the creamery and will remodel same into a factory for tractor engine.

S. D., Wagner—M. E. Mitchell has submitted a proposition to erect a flour mill here.

S. D., Watertown—Equipment is being installed and the incubator factory will begin operations Jan. 1, Mr. Cook states that a new factory will be erected in the spring.

S. D., Yankton—Yankton Brick Yard Co. will build a new plant here. Wm. Pantle, president; D. B. Gourney, vice president.

Wash., Walla Walla—U. S. A. are contemplating erection of a branch factory at Waubunum, Alta.

Wis., Gillett—Factory of the Great Northern Pail Co. was burned; valued at \$25,000.

Wis., Manitowoc—Manitowoc Church Furniture Co. incorporated capital \$40,000, will erect a modern factory building, 600x400, concrete construction, concrete floors, modern dry-kiln, motor power, sprinkler system; to be in operation Dec. 1, 1914; Chas. F. Schuetze, manager.

Wis., Merrill—The Chamber of Commerce Co. has purchased the Meyer Cheese Box Factory and will erect a new factory soon.

Wis., Oshkosh—The Mathisen Boat factory has been rebuilt and will be in operation first of year.

Wis., Wausau—Advancement association has secured a rubber factory for this place.

Wis., Wheeler—A pickle factory will be established here.

Iowa, Tama—Harlan & Pitka will erect a large brick garage about 70x170, 2-story, plans not completed.

Minn., Aitkin—D. W. Harper is building a large garage.

Minn., Campbell—A modern concrete block garage will be erected here, by Wm. Voss and L. O. Gaylord, in the spring, 50x60.

Minn., Long Prairie—M. P. Krause of the Krause Automobile Co. will erect a modern up-to-date garage, 1-story, fire-proof.

Minn., Sauk Rapids—A modern garage will be erected here.

Minn., Winnebago City—Max Knopf is erecting a barn, 26 x54, concrete foundation.

Mont., Forsythe—Work is nearing completion on the Woolston garage.

Mont., Great Falls—Permit issued to C. E. K. Vidal, for a 1-story frame garage at 811 4th av. N., cost \$600.

Mont., Lewistown—Fire destroyed the barn of Perk Burnett; loss about \$1,000.

Neb., Havelock—Contract awarded to E. A. Hughes and A. L. Butler, for erection of an artificial stone garage building, 25x100, for Ed. Laxson.

Neb., Rushville—Wm. Chamberlin is having an addition built to his garage.

N. D., Ellendale—Henry Strand will build a barn, 30x60, with hip roof.

N. D., Englevale—Fred Goodfellow's barn was burned; loss about \$3,000.

S. D., Abdeen—Fire destroyed the large barn on the Lincoln ranch; loss about \$4,000; insured.

Wis., Cuban City—Heim Bros. will erect a concrete garage, 50x100, cement roof and cement block front, fireproof, steam heat, toilets, rest rooms, office, etc.; Z. F. Conlon, contractor.

Wis., Milltown—C. J. Olson will erect a garage, 24x30, modern.

Wis., Sheboygan—Contract let to Chris Zelle & Son for erection of a garage for August Herrman.

CHURCHES

Notes Arranged Alphabetically by States.

Alta., Camrose—Bids received Dec. 22 until 12 noon, for plumbing, heating, ventilating, etc., in the normal school; check for \$10 John Stocks, deputy minister of public works.

Iowa, Cedar Falls—St. Paul's Catholic church was damaged by fire \$5,000. Rev. Luke Donlan, pastor.

Iowa, Davenport—Trinity Cathedral's parish will erect a community house; cost about \$45,000.

Iowa, Des Moines—A 2-story addition will be erected to Central Church of Christ.

Iowa, Muscatine—Presbyterians are planning to remodel their church and install an up-to-date two plant system; cost between \$30,000 and \$35,000.

Iowa, Muscatine—Plans are being made for erection of a new church for the Baptist association.

Iowa, Muscatine—M. E. church plans on remodeling and erection of a Sunday school room soon.

***Man., Thunder Hill**—Dan Howe, J. Stewart, Alexander and Goodman were appointed to look up site for erection of a Presbyterian church.

Minn., Mapleton—Architect H. C. Gerlach, is drawing plans for a German Lutheran church to be erected here; cost \$20,000; 60x36, construction to commence in spring.

Mont., Cowley—Plans are being discussed for erection of a church school.

Mont., Hobson—Catholic society have plans for erection of a church and parsonage.

Mont., Jefferson—A new church will be erected here, modern.

Mont., Kremlin—Norwegian Lutheran church has organized August Berg, I. Havskjold and Gilbert Gilbertson, committee who will secure site for erection of a church.

Mont., Missoula—Bids received Jan. 15, 1914, for erection of a Presbyterian church, 90x90, cost about \$550,000; Ole Bakke, architect.

Mont., Wibaux—Bids being received on superstructure of gymnasium and parish house for the Congregational church; A. Terryberry, 714 Palladio building, Duluth, Minn., architect; 55x60.

N. D., Hillsboro—Catholics will build a church and parsonage; work begun on basement; cement block construction, 40x75.

N. D., Moorhead—Parish of St. Joseph will erect a convent for Benedictine sisters, architect, A. J. O'Shea of Fargo, will prepare plans.

***Ont., Port Arthur**—Mr. Bertram Grosvenor Goodhue, architect of New York, was in Port Arthur in regard to plans for erection of a new Anglican church; construction to start in spring.

GARAGES AND BARNES

Notes Arranged Alphabetically by States.

Iowa, Dubuque—Fire destroyed the 16x54 barn of Albert Pluckiger; loss estimated \$3,000.

Iowa, Grundy—Work has commenced on the new feed shed for Mr. Bockes, 140x150; H. E. Gardner & Son and O. A. Fritzel, contractors; concrete base, cement block walls, modern.

Iowa, Linden—Wm. Tegard is building a garage, 18x24.

Iowa, Storm Lake—Plans are being made for erection of another garage in Manson.

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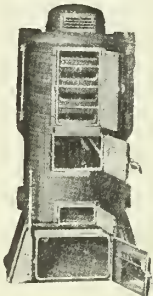
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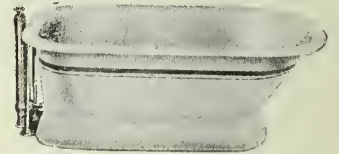
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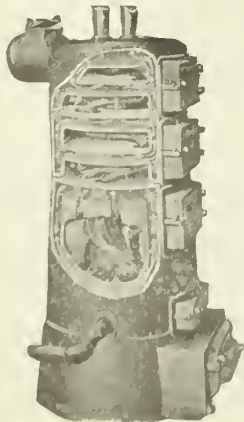
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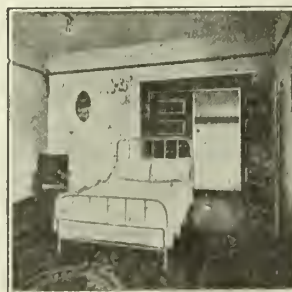
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Portland, Ore—Rose City Park Methodists have purchased a site and will erect a church; cost \$10,000.

Sask., Russellville—A site for a new school has been chosen and building will commence in spring.

S. D., Hoven—A 1-story and basement church will be erected, by St. Bernard's R. C. church; cost \$80,000, architect, Anton Dohman, 14 Metropolitan building, Milwaukee; building postponed until spring; address in care of architect.

Wash., Seattle—Synagogue will be erected by congregation of Chevra Bikur Cholim, cost approximately \$40,000; contract awarded to B. Marcus, Priteca, H. Keesler, president; Joe Taylor, vice president.

Wis., Milwaukee—Work has begun on erection of Thomas Aquinas Catholic church; cost \$100,000; three buildings being erected; church, pastoral residence and nuns' convent.

Wis., Milwaukee—Plans have been drawn for erection of a Spiritualist church, \$30,000 being raised for construction. Dr. Herman Nick, 603 Grand av., chairman.

Wis., Racine—A 1-story and basement school and church will be erected, 40x100, by the Danish Lutheran church, James Jorgenson, chairman of committee, 926 State st., Racine, Wis., cost \$15,000; Leiser & Holst, architects, 402 Germania Life building, Milwaukee plans in progress will build in spring.

Wis., Stoughton—Christ Lutheran church will erect a \$20,000 church and guild house.

ELEVATORS

Notes Arranged Alphabetically by States.

***Alta., Calgary**—Plans are being made for erection of a new elevator; bids called for in spring.

Minn., Chisholm—Lars Brude is agitating question of a potato warehouse.

Mont., Belmont—It has been decided to erect a 30,000-bushel elevator; H. B. Drum, O. H. Helgeson and others interested.

Mont., Bynum—Work is progressing on the elevator being erected by Mr. Brewsted.

Neb., Wakefield—The Farmers' Elevator Co. are having an addition built to their elevator.

N. D., Alexandria—Business men have organized a company and will erect an elevator, 35,000-bushel capacity. (The Alexander Grain Co.)

N. D., Grand Harbor—15,000 bushels of grain was burned when fire destroyed the Farmers' elevator at Grand Harbor; loss about \$20,000; Al. Gesens, president.

N. D., Valley City—Farmers' Elevator Co. incorporated, will build a new elevator, at Brera; companies also formed at Lanona and Cuba, which will build elevators.

Wash., Seattle—The Port commission adopted a resolution providing for construction of a 500,000 bushel grain elevator on the east waterway. L. C. Crow, president, Colfax.

Wis., Eau Claire—Hoepfner-Bartlett are erecting addition to the C. W. Cheney Co. elevator, 16x70.

PARKS AND CEMETRIES

Notes Arranged Alphabetically by States.

Minn., St. Cloud—City Engineer West was instructed by the park commission to prepare plans and specifications for acquiring the property on east side of river for park purposes.

Minn., Virginia—Improvements will be made in Oliver Park in 1914.

Wis., Racine—Plans will soon be completed for the new Graceland cemetery, Hare & Hare, Kansas City, architects.

MISCELLANEOUS

Notes Arranged Alphabetically by States.

Alta., Calgary—A big abattoir may be erected here, and a proposition will be voted on providing for the money.

***Alta., Calgary**—The site for the proposed industrial building will be decided on by the new council.

***Alta., Calgary**—A proposition voting \$360,000 for improvements to the plant and buildings of the exhibition here, will be submitted to the taxpayers.

Iowa, Cedar Rapids—All property owners have signed contracts with the river front improvement commission, and it is expected that two blocks of sea wall will be built next year; Thomas H. Simmons, chairman of the commission; contract for the construction work has been made with the Blackhawk Construction Co., Waterloo, Iowa.

Iowa, Estherville—Whether to build a large or small dam across the Des Moines river is the question here.

Minn., New Ulm—This city is considering building an abattoir; address city clerk.

Minn., Red Wing—A new green house, costing \$750, is being erected at the training school. W. H. Brown an experienced man from the east has charge of the construction work.

Minn., Two Harbors—Contract with Mitchell McGary, Duluth, for construction of a coal dock here; to be of steel and concrete and about 50 feet longer than the present wooden one.

***Mont., Havre**—An outfit is drilling here for natural gas and expect to go 4,000 feet if it is not found before; the Stoner-Lockwood-Stoner Co. is operating the drill.

Wis., Chippewa Falls—The Chippewa Valley Railway, Light & Power Co. has plans made to build a 60-foot dam across the Chippewa river at Paint creek for power purposes. The power from this dam will probably be 50,000 h. p. and will be sold all over northern Wisconsin and Minnesota.

Wis., Sheboygan—An appropriation is asked for from the city council to improve the inner harbor so that boats may be moored here for the winter; address city clerk.

NEW FIRMS INCORPORATED

Notes Arranged Alphabetically by States.

Ill., Joliet—The Joliet Forge Co. has been incorporated with a capital stock of \$80,000, by J. J. Sharpe and J. A. Holmes.

Iowa, Alden—Hale Roberts Stone Co., capital \$100,000; Hale Roberts, Iowa Falls, president.

Iowa, Burlington—Oliphant Water Motor Co., capital \$15,000; Alfred Oliphant, president.

Man., Winnipeg—The Winnipeg Power Co., Ltd., has been organized by Ernest Firth, C. W. Chappell and others, with a capital stock of \$1,000,000, to generate electricity.

Man., Winnipeg—Empire Water Works Supply Co.; G. Irving and others, capital \$100,000.

Minn., Anoka—Beasecker Manufacturing Co., capital \$30,000; V. C. Beasecker and others.

Mich., Detroit—Leggett Engineering Co., capital \$10,000; Ross M. Leggett and others.

Minn., Minneapolis—Donaldson Realty Co., capital \$1,000,000; Lawrence Donaldson. Minneapolis Trunk & Satchel Co., capital \$50,000,000, Henry Hennecke, president. Harriet Loan & Realty Co., capital \$25,000; M. F. Venie, president, B. F. Powers, vice president. Citizens' Loan & Investment Co., capital \$50,000; M. L. Fosseen and others.

Wis., Racine—Racine Boiler & Tank Co. has been incorporated by H. L. Wratten, F. H. Fahey and Wm. Tuebner, with a capital stock of \$10,000.

RAILROADS

B. C., Vancouver—Work will start Jan. 1, on 8-mile tunnel through Selkirks at Rogers Pass, C. P. R. R.; cost \$8,000,000; completed in three years; contract let to Denver firm.

Mont., Dickson—Work probably will begin on Dickson-Polson branch N. P. early next year, according to W. E. Child, attorney, Bateman Construction Co., now at work on G. N. east of mountains, said to have been engaged for Dickson-Polson line.

Mont., Lewistown—Carpenter Creek Railway Co., incorporated this week; capital \$50,000, from Japan, Musselshell county, through sections 5, 8, 17, 20, 9 and 30; offices at Musselshell; directors, C. M. and B. C. Jacobs, V. C. McCleary, all of Musselshell.

N. D., Jamestown—Midland plans the construction of a line to Grand Forks and Winnipeg, through Sherbrooke.

Ont., Ft. William—H. J. Hare who has furnished survey of railroad line Ft. William to Duluth, following Lake Superior shore, announces construction will start in spring.

Wash., Seattle—N. P. expects to complete in near future, Ellensburg cutoff to Ritzville, 100 miles; also Grand View to Gibbon, main line.

RESIDENCES

Notes Arranged Alphabetically by States.

Iowa, Allison—R. Burnridge and crew are building a residence for F. H. Hill.

Iowa, Gracswold—Lewis Cocklin is building a modern residence.

Iowa, Sac City—Henry Johnson is erecting a residence.

Iowa, Sioux Rapids—Fred Dierks and F. M. Dodge have plans for a new modern residence.



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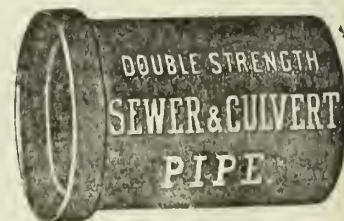
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DES MOINES, IOWA

Iowa, Craig—F. Nanninga will erect a \$3,000 residence in Ireton.

Iowa, Dougherty—Chas. Merrick is building a new residence.

Iowa, Ellsworth—Work has begun on residence for N. J. Nelson, 22x32, modern throughout.

Iowa, Forest City—W. C. Lingren is building a residence.

Iowa, Hudson—W. E. Shimmer has finished foundation for residence which he will erect this winter.

Iowa, Nevada—John Boho will build a modern cottage.

Iowa, Shenandoah—Thorn Walling has started bungalow, 2-story; cost \$2,000.

Iowa, Sioux City—A 2-story and basement residence will be erected by Myra Bender, 31x41, architect, F. E. Colby, New Davidson office building, frame, vitrified and common brick, veneer, shingle roof, wood cornice, contractors figuring preliminary plans; cost \$6,000.

Iowa, Sioux City—Plans are being drawn by Buettler & Arnold, architects, for an \$18,000 residence for B. M. Stoddard, individual lighting system, modern throughout.

Iowa, Sioux City—A 2-story and basement house will be erected by Harry Burns, 1223 McDonald av., frame, shingle roof, private plans; owner will do electrical work; cost \$3,000; 24x30.

Iowa, Sperry—C. K. Schantz will build a tenent house.

Iowa, Storm Lake—Chas. A. Preston is building a modern house.

Iowa, Terril—Fritz Buhr is building a new house, modern.

Iowa, Williamsburg—Milo Black is excavating for a new residence.

Minn., Beauford—Max Runke will build a residence.

Minn., Belview—The Lutheran Association will install a hundred-light acetylene lighting plant in the parsonage.

Minn., Elmore—Rodney Ekleberry is erecting a modern residence.

Minn., Fairmont—Work has commenced on foundation for residence for Mrs. Frederick A. Miller of Fraser.

Minn., Fairmont—Mrs. Frederick Miller has begun work on her residence. Fred Dorendorf is building foundation.

Minn., Faribault—Fire destroyed the residence of Jos. Otley, loss about \$1,700.

Minn., Gary—Contract awarded to H. J. Vaughn for construction of a dwelling for Oscar Thordahl.

Minn., Glyndon—Peter Mack is building a modern house.

Minn., Kenyon—Fire destroyed the residence of Elling Bakke; loss several hundred dollars.

Minn., Lester Prairie—Emil Mathews will erect a modern residence.

Minn., Luverne—Ole Troffeland is building a new residence, 16x28, with addition, 14x16, modern; Larson & Berg, contractors.

Minn., Mankato—John N. Deglman will erect a \$4,000 residence in spring.

Minn., Mankato—J. M. McDonnell let contract to Gus. Klien-schmidt for erection of a modern bungalow.

Minn., Menasha—W. A. Rouse of Spruce Grove will erect a modern house.

Minn., Minneapolis—Fire damaged the home of E. G. Robb, to extent of \$2,000.

Minn., Montevideo—Jack McClay is building a dwelling.

Minn., New Ulm—A 2-story brick modern residence will be erected by Ernst Wicherski.

Minn., New Ulm—Contract awarded to Wm. J. Finn, Minneapolis, for five residences for Joseph Bianchi, Wm. Becker, Peter Ritschel, Henry Held and Ed. Honl.

Minn., Red Lake Falls—J. A. Nicholson will build a modern residence.

Minn., Slayton—Carl Pieck and Verne Roop are installing a heating plant in a residence at Lind, Minn. Croskrey.

Minn., Verndale—Joe Croskrey's house was burned; insured.

Minn., Watson—Lars Nelson is building a dwelling.

Minn., Willmar—Chas. S. Johnson is building a residence, modern throughout.

Minn., Zumbrota—Albert Berndt will build a modern residence.

Mont., Anaconda—Three building permits were issued for erection of three bungalows for W. H. Shatuck and S. Dug. Allen, L. F. Thibodeau, contractor; cost of three \$10,000.

Mont., Billings—W. E. Waldron is building a residence, modern.

Mont., Billings—The Montana Mortgage Co. will soon commence the erection of a \$3,500 bungalow on N. 31st st.

Mont., Billings—John Unfer will build a modern residence.

Mont., Fairview—Henry Pominville is building a modern residence.

Mont., Great Falls—Permit was issued to F. H. Reed for a 1-story frame dwelling at 3610 4th av. S., cost \$1,000.

Mont., Great Falls—Hansch & Nichols have received per-

mit for erection of a 1½-story dwelling at 611 7th st. S., \$4,000.

Mont., Great Falls—Fred A. Woehner, fireproof with gravel and tar, 224-6 1st av. S.; cost \$150; permit issued to Mrs. Wm. Grills, for 1½-story frame dwelling, 905 Central av. W.; cost \$300; Wm. C. Hodge, 1-story frame residence at 506 4th av. S.; cost \$1,600.

Mont., Great Falls—P. F. Kearney has permit for erection for a 2-story frame dwelling, at 117 2d av. N., cost \$7,800.

Mont., Great Falls—Permits were issued to the Cozy Home Builders' association for erection of a 1-story frame dwelling at 1720 2d av. N., \$3,000; L. Clause, 1-story frame bungalow, at 1309 2d av. S., \$2,300.

Mont., Great Falls—Permit was issued to Oscar Swanstrom for a 1-story dwelling; cost \$1,700.

Mont., Hamilton—W. A. Stuart is building an 8-room bungalow, on his ranch; cost \$3,000.

Mont., Havre—Home Builders Investment Co. will soon start building several houses.

Mont., Havre—Fire destroyed the residence of Albert Davey.

Mont., Huntley—A new modern residence is being built by Mr. Gehowski.

Mont., Lavina—Fred D. Glover is building a modern residence, 32x32.

Mont., Livingston—Contractor Ben Dindorf is completing a suite of twelve rooms in rear of Maverich Club rooms, for John Harvat.

Mont., Redstone—Albert Ator will erect a house.

Neb., Blair—Frank Linden will build a large modern 1-story bungalow, 45x30.

Neb., Bruno—Louis Tonek will build a modern residence. Chambers—Mrs. J. D. Crimes plans to build a residence. Crab Orchard—O. M. Platt is having a residence erected. Dalton—Jake Mayer is erecting a dwelling; J. B. Hire is building. Mr. Volger of Petersburg, Neb., is building a residence. Curtis—J. S. Hatcher will build soon. Hubbel—Joshua Lamb plans to build a house. Murray—Mrs. Eliza Young will build a modern residence. J. W. Thompson is preparing to erect a house. W. W. Hamilton, contractor. North Platte—Otto Thoelecke will erect a modern dwelling soon. Scottsbluff—Otto J. Hehnke is drawing plans for a modern house for A. E. Sheldon. Sidney—W. A. Reed is erecting a dwelling. Thurston—Messrs. Crellin of Pender and White of Lyons will erect new residences. Uehling—Foundation has been completed for Mrs. Hartwig's residence. Uehling—Work on H. Christensen's residence is nearly completed.

Neb., Crab Orchard—O. M. Platt is having a house built. Dalton—Jake Mayer is erecting a modern house. Sidney—J. B. Hire is erecting a residence. Sidney—Mr. Voglar of Petersburg is erecting a residence. J. D. Grimes will erect a modern residence. Sidney—W. A. Reed is building a cottage bungalow. Hebron—A 2-story modern residence will be erected by Joshua Lamb, 24x24, F. E. Denton, contractor. Homer—W. V. Stuteville's residence is nearing completion. Plattsmouth—Mrs. Eliza Young will erect a modern residence in the spring. Murray—J. W. Thompson is planning to erect a residence. W. W. Hamilton, contractor. Uehling—Work will soon start on Mrs. Hartwig's residence. Scottsbluff—Otto J. Hehnke is erecting a modern residence for A. E. Sheldon. Potter—Dr. Ames will build a cottage. David City—Louis Tomek will build a modern residence.

Neb., Edgar—Excavation has begun for modern residence for C. Stayner.

Neb., Omaha—Fire destroyed the residence of Ben Morrison, valued at \$3,000.

Neb., Waunita—Claud Fraser is building a residence. Wynot—A new residence will be erected for Henry Smith. Wisner—Otto Greenwald is building a house. Rockville—Ralph Sunderstrom will build a house. Peru—J. N. Dillon is building a house. Papillion—Henry Doebein & Son have a force at work on house for Mrs. Chas. Leaders. North Platte—Mr. J. C. Hollman is building a residence. Loup Center—Dr. Chase is building a residence. Lyons—Robert Redding is planning to build. Kearney—Contract awarded to Louis Hayward for erection of a residence for W. F. Crossley. Kearney—Ray Turner is building. Havelock—Jas. Headrick is building a 5-room bungalow. Havelock—Geo. F. Ackerman is building a cottage. Rushville—W. R. Kent is building. Hartington—Frank Hochstein is building a house. Peter Bonertz has commenced building. Ainsworth—James Sage will build a modern house.

N. D., Bismarck—J. D. McDonald will build a residence.

N. D., Enderlin—Dr. Norriss will build a modern residence.

N. D., Mott—Basement is being excavated for erection of new M. B. parsonage. Schackle.

N. D., Ryder—Leslie Lewis has let contract for erection of a large house to Sever Scherbheim, contractor.

N. D., St. John—The residence of F. Martineau was destroyed by fire.

S. D., Howard—Farm residence of Courta Maddox on Rock Creek was burned.

S. D., Howard—Malvin Hauge is building.

S. D., Nisland—W. E. Benedict is erecting a new residence.

S. D., Plana—Fire destroyed residence on the Lincoln ranch.

S. D., Watertown—Fire destroyed the residence of Geo.

Wis., De Pere—M. C. Connors, S. Canal st., Chicago, will build residence, contract let to John Nelessen, Wrightstown, Wis., mill work and interior finish to Diekman Manufacturing Co., Green Bay, Wis.; heating, plumbing, wiring not let yet; 2-story, 29x41, frame, maple floors; cost \$4,000; completed June 1, 1914; architect, Geo. L. Smith, S. Kaukauna, Wis., day work.

Wis., La Crosse—The residence of Mr. Hyslip was burned; loss about \$1,500.

Wis., Madison—Permits were issued to T. C. Thompson, for a \$4,000 residence and to Thomas Lofthus, for a \$2,000 house.

Wis., Madison—Contract let Nov. 12, for residence for Chas. B. Sprecher, 1045 Williamson st.; mason, plastering, cement work let to Olson Bros., 512 S. Brooks; carpenter, Newell Bros., shingle, metal, Wm. Schmidt, 1402 University av.; plumbing, Anton W. Schwoegler, 828 Wash. av., 2-story, 25x36, frame, wood; cost \$5,000.

Wis., Manitowoc—Plans are in progress for residence for John Chloupek, general contract to Jorgensen & Schneider. Bids on plumbing, heating and electric later; cost \$3,000; architect Earl F. Miller.

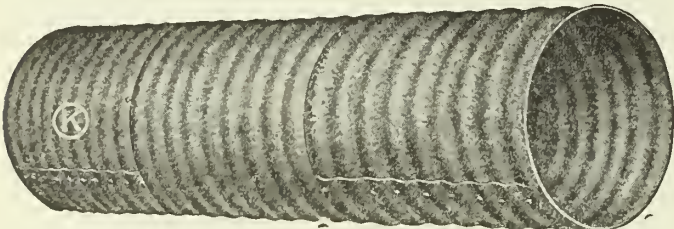
Wis., Mt. Horeb—Clarence Finke and John Bakken will erect residence.

Wis., Oshkosh—Ground was broken for erection of a 3-story flat building, 36x58, estimated cost \$20,000; modern throughout Dr. M. E. Corbett, builder.

Wis., Sheboygan—Plans being prepared by architect, W. C. Weeks, for a 2-story and basement, 35x39, residence for Paul Koehn, 814 N. 6th st., frame and plaster (Kell stone), wood lath, shingle roof, brick fireplace, hot water heat; cost \$7,500.

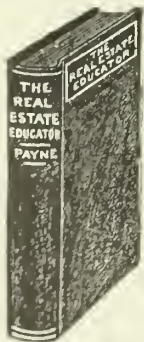
Wis., Sheboygan—Carpenter Contractor Julius Wider is building a 2-story residence; modern.

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THE IMPROVEMENT BULLETIN, Minneapolis

MILWAUKEE

A 15-story fireproof structure, of concrete and steel construction, with ornamental brick and stone exterior, will be erected on the half block between W. Water and 2d sts., facing Grand av., according to information given Building Inspector Harper by F. W. Anderson, of Chicago, agent for architects, Carrere & Hastings, 225 5th av., New York. The site is owned by the Plankinton estate and has been leased for a long term of years by Charles W. Sommers, Cleveland capitalist. Rumors as to the plans for new structures have been spread during the past few months but this latest report is considered as authoritative. Before June 1, 1914, work will be started at razing the present buildings and construction work will follow immediately. The new structure will extend from Grand av. back to the alley and cover the entire block from W. Water to 2d sts. The center will be occupied by a theater, one side of which will be hotel and the other a large office structure, all 15-story. The cost will reach \$4,000,000.

The board of regents of the Milwaukee Normal school has purchased fifteen acres of land for over \$100,000 north of the school with 7,000-foot frontage on Kennwood blvd. No immediate building operations are planned but the prospect of higher prices brought about the deal. The site will in the meantime be parked and used as an athletic field.

The Badger Architects, 916 Walnut st. are taking bids for the construction of a 3-story office, store and apartment building for Albert A. Rheins at 7th and Walnut sts.; to be 50x74, of brick, steel and concrete construction, containing 4 stores on ground floor; mason awarded T. A. Lush and excavation to George Kulick.

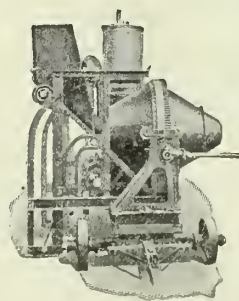
The Fred Miler Brewing Co. has purchased the northwest corner of Grand av. and 5th st., occupied by a brick structure. The site measuring, 142x200, will be improved after leases expire, May 1, 1914.

The recent estimates for public works submitted to congress included an appropriation for a lighthouse depot for Milwaukee in amount of \$200,000.

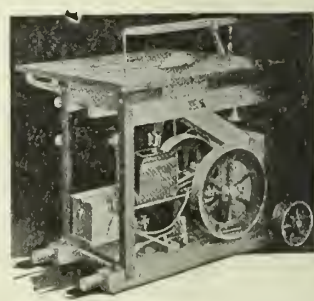
STREET AND ROAD WORK

Wash., Seattle—Committee of council favors paving 2d av. with brick; cost is estimated at about \$80,000; address the city clerk.

Wis., Green Bay—It is proposed to pave Cedar Creek road with concrete at a cost of about \$20,000; Elmer S. Hall, county clerk.



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RECENT LEGAL DECISIONS

WATER WORKS CONSTRUCTION—AUTHORITY OF ENGINEER.

Incorporated town of Stonewall Okla., vs. Stone.—Where plaintiff built a water works system for defendant town in accordance with plans and specifications furnished by an engineer employed by the town, he was not bound to inquire into the limitation on the engineer's authority; and in an action to recover a balance due on his contract, the contract between the town and engineer is immaterial, in the absence of proof that plaintiff knew of any departure therefrom by the engineer.—United States Circuit Court of Appeals, 207, F. R., 540.

DECIDE ON COMPREHENSIVE ROAD PLAN.

Springfield, Iowa.—The principal roads of Sangamon county which are to be paved first under the Tice Good Roads act have been decided upon by the highway committee of the board of supervisors, in connection with the highway committee of boards in adjoining counties, and the state commission. The routes to be paved have been arranged so that every town of importance in the county is on one of the roads, and the roads will join paved roads in other counties, forming direct routes of many miles in length. The projected routes comprise 280 miles of the 1,400 miles of road in the county. About \$40,000 will be spent on paving of roads next year, and each year hereafter as much or more will be used until the entire projected series of pavements is complete.

WABASHA COUNTY DRAINAGE CONTRACT.

W. E. Davis et al., appellants, vs. James Forrestal et al., respondents.

The contractors for the construction, under the drainage statutes, of a judicial county ditch and their surety who have been sued by the sub-contractors for a balance due, brings this action against the sub-contractors, the latter's surety, the county, and two owners of land adjacent to the ditch, who have threatened to sue plaintiffs for flooding their lands, to enjoin the sub-contractors and each defendant from maintaining or bringing any action against plaintiffs on account of the ditch construction, and to have the various claims of the parties determined, alleging that the failure of the sub-contractors to complete their contract is alone the cause of the injury to the land owners, held:

The contractors do not show irreparable injury nor that their remedy at law is inadequate, nor does the plaintiff surety show any cause of action.

The sole ground for enjoining defendants from suing being to avoid a multiplicity of suits which may consider the number of suits which may be avoided, the statutory provisions for reducing this number, the efficiency of such provisions for giving plaintiffs adequate relief, the convenience and pecuniary loss of the parties, the apparent as well as anticipated issues between the different parties and the importance of preserving to each the right of a pure trial in determining whether jurisdiction should be entertained or refused.

When the rights of plaintiffs as to the different defendants and the rights of the latter as between each other are considered it is clear that even though the different rights may grow out of the same act the issues of law and fact arising therefrom as between the individual parties are not the same and equity should not assume jurisdiction in purely legal controversies based on such varied rights.

A different rule applies where a plaintiff has an equitable cause of action for where equity jurisdiction attaches as a matter of right, the claims of all proper parties to the suit will be adjusted, notwithstanding that such claims constitute actions at law triable to a jury.

The court under the allegations of the complaint being justified in refusing to entertain the action at all, clearly did not abuse its discretion in denying the application for temporary injunction.

Order affirmed.

Opinion by Justice Holt.

\$4,000 VERDICT UPHELD.

A \$4,000 verdict for a disabled ankle in favor of Frederick Falkerberg against Bazille & Partridge, St. Paul decorators, was upheld by the state supreme court today.

The verdict by the Ramsey county district court was appealed by the defendants on the ground of contributory negligence.

CONCRETE MIXERS

The mixers described and illustrated here are in almost every case the latest models as they will be manufactured and sold in 1914. It has been impossible for The Improvement Bulletin to put to actual test the claims made for every mixer. For our information about each mixer we have gone straight to the man who knows most about it, namely, its maker. Practically all statements made can be backed up with letters from users. Prices on all mixers can be secured direct from the manufacturers at the addresses given. The manufacturers of the mixers described will be taken up in alphabetical order, according to the name of the company.

NAME—LITTLE BOSS CONCRETE MIXER

MANUFACTURED BY—AMERICAN CEMENT MACHINE CO.

ADDRESS—1006-18 JOHNSON ST., KEOKUK, IOWA.

The Little Boss Mixer, of which so many are in use in the Northwest, is being improved by its makers and a detailed description will not be available for some little time yet. The Bulletin will publish further particulars about improvements described here, as information is received.

NAME—ARCHER CONCRETE MIXER.

MANUFACTURED BY—ARCHER IRON WORKS

ADDRESS—CHICAGO ILL.

NAME—THE ATLAS MIXER

MANUFACTURED BY—ATLAS ENGINEERING CO.

ADDRESS—780-90 30TH ST., MILWAUKEE, WIS.

Price—\$275.00, complete with power equipment.

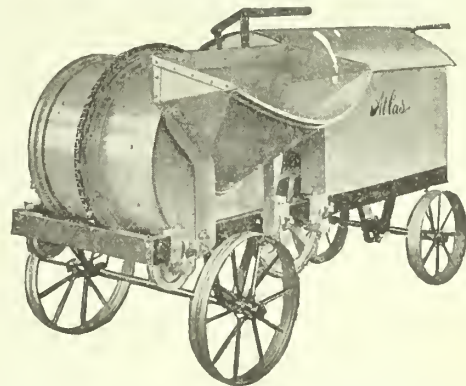
The Atlas is one of the smaller concrete mixers and is a machine built for hard, continuous service. It is easily moved from place to place and has large capacity.

SPECIFICATIONS.

Dimensions—Frame is of 4-inch channel, 35 inches wide and 90 inches long. Height of frame from ground, 22 inches. Rear wheels, 24 inches in diameter, 40-inch thread. Front wheels, 20 inches in diameter, 28-inch thread. Housing, 37 inches wide, 48 inches long.

Capacity—5 cubic feet dry,—50 cubic yards mixed material per day.

Power—3 H. P. horizontal, hopper cooled, gasoline engine. Cylinders, piston and piston rings ground.



Transmission—Chain drive through counter-shaft.

Lubrication—By compression grease cups conveniently located on the outside of the frame. Engine lubricated by two oil cups.

Hopper—43 inches from ground. Has capacity for one complete batch.

Spout—Inclined at an angle of 35 degrees for discharging and discharge end is 26 inches from the ground.

Weight—1,650 pounds net.

The Driving Mechanism—The engine drives the drum by means of chains; a counter-shaft being used to reduce the engine speed of 425 to the drum speed of 20 revolutions per minute. A clutch is provided on the counter-shaft so that the engine can be run idle when starting up. The engine may be started, however, with the clutch in and it is not usually stopped until it is desired to shut down the mixer.

Engine Housing—The engine is completely enclosed in a steel housing which thoroughly protects it from sand and dirt and keeps out the wet when the mixer is not in operation. The side is usually removed to allow a free access to the engine and when closed can be locked up to keep curious persons from tampering with the engine. By removing four bolts the entire housing can be removed.

(Continued on page 47.)

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Imitation Caen Stone.

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Dumb Waiters. Reliance Ball-Bearing Door Hangers. Ash Cranes.
Mortar Colors, Insulite Waterproofing, Insulite Mastic Flooring, Side-
walk Elevators. Hand Elevators. Safety Treads. "Bitucoat". Bitu
Mortar Water-proofing Compound. Atlas Composition Flooring,



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Minnesota Fama Stonewood Co.
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Thorp Fireproof Door Co.
Trussed Concrete Steel Co.

INDUSTRIAL PROGRESS

A NOVEL DAM.

To reduce the cost of foundations, always a serious item and one which in a great number of cases prevents development of cheap power, a novel principle of dam construction is now being tried in Canada. In an experimental dam which has been constructed a series of holes were bored in the sides of the stream, which are of rock sloping at 45 degrees, and in each of these holes a strong steel bar was fixed. From each of these bars steel cables were then stretched to the corresponding bar on the opposite side, the cables being made taut by a capstan arrangement fitted to the bars. The bars were stayed to the bank behind them by steel stays attached near the top of the bars by ball-bearing rings so as to permit them to rotate freely. The steel cables were wound round with hempen rope just up to the point where they reach the capstans. In stretching the cables care was taken that they all lay accurately above one another in the vertical plane. In the final stage plates of sheet iron were lowered on the up-stream side of the cables, these being held in place by the water pressing against them. Should it be found advantageous to level the bottom subsequently this can be done by sinking bags of gravel. The patentee claims for his method low first cost, simplicity, and rapidity of construction.

FIRE TESTS WITH DOORS.

Some tests carried out on two reinforced concrete doors submitted by Messrs. Chubb & Sons' Lock & Safe Co., Ltd., to the British Fire Prevention committee were designed to ascertain the effect of a fire of 240 minutes duration, at temperatures up to 2,050 degrees F, followed by the application of water for five minutes on the fire side. Both doors consisted of a steel sheeting, with the center reinforced with steel bars and filled in with concrete, and they measured approximately 4 feet by 7 feet. One was hung on runners made to slide, and was fixed on the inside of an opening, and the other was hung on hinges and was fixed in a reveal on the inside of an opening. In the first case the door buckled away from the brick jamb by $\frac{1}{4}$ -inch to $\frac{1}{2}$ -inch within 45 minutes from the start of the test, and in 85 minutes the face of the steel casing on the outside had also buckled, whilst a slight flicker of flame passed around the edge and continued to appear at intervals until the end of the test. In the second case the door had buckled inwards slightly within 40 minutes of the beginning of the test; in 85 minutes the face of the steel casing on the outside had buckled slightly, and in 152 minutes the door had buckled inwards 1 inch down the center at the top and three-eighths at the bottom, but neither fire nor water passed through it. The committee's classification of "full protection" was granted for this door.

ONE-STORY SCHOOL BUILDINGS.

The Architect and Engineer of San Francisco, states that Oakland, Cal., has revolutionized its school buildings. The radical changes include a decrease from two or three stories in height, to one story. One effect of the new way is appreciation instead of depreciation of surrounding property.

The general lines of the later renaissance and northern Italian architecture have been adopted in some of the buildings, but these have been so modified and changed as to produce a distinctive type and one which is admirably suited to the California landscape and climate. Each building is surrounded by large playgrounds and recreation centers for the older children, and patios and cloisters furnish play spaces for the younger.

All class rooms are so arranged that they may easily be thrown into open-air rooms, and in the schools already finished this feature has worked a great benefit to the general health of the pupils, with a consequent betterment in the class work. Statistics on the health improvement are being compiled by the medical department of the Oakland board of education.

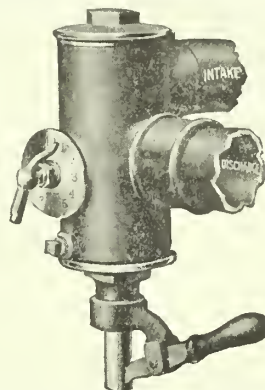
REPAIRING HOLES IN CONCRETE CEILINGS.

Where it becomes necessary to repair a ceiling that has a hole caused by falling out of some of the concrete, the following method, described by the Concrete Cement Age, will prove satisfactory. The method is to pour a thin grout through a hole drilled through the concrete, the grout being kept in place until it sets by a light panel supported with an upright from the floor. The upright can be of such length as to be sprung lightly in place, or it may be wedged up from the floor.

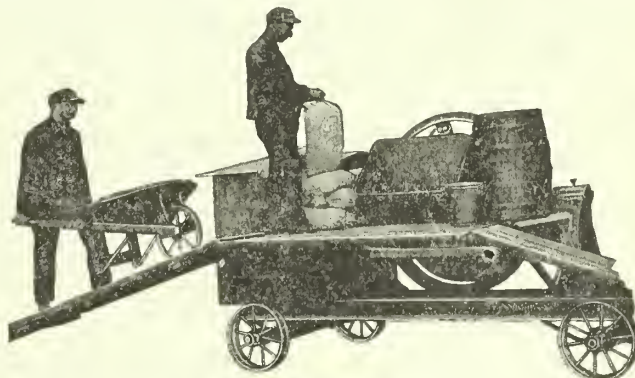
CONCRETE MIXERS --- Continued.

MANUFACTURED BY—BADGER CONCRETE MIXER CO.
NAME—THE BADGER CONCRETE MIXER.
ADDRESS—MILWAUKEE, WIS.

The Badger has so many improvements listed for 1914 in connection with its new manufacturing plans that no detailed description is possible at this early date.



A specialty that is manufactured by this company for use on any concrete mixer made, is the Badger Water Valve. One pressure of the lever delivers the required amount of water for each batch of concrete. No tank is required with this valve when there is water pressure. It can be attached to the frame and connected to the hydrant with a rubber hose. The action of the closing device is automatic. Price may be had on application to the Badger Concrete Mixer Company, Milwaukee.



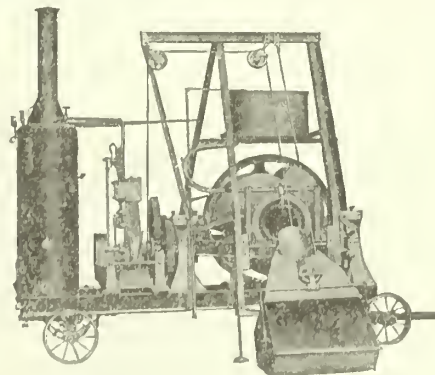
The Clover Leaf with folding loading platform.

NAME—THE CLOVER LEAF CONCRETE MIXER.
MANUFACTURED BY—CLOVER LEAF MACHINE CO.
ADDRESS—SOUTH BEND, IND.

The Clover Leaf takes its name from the shape of the drum, which follows the principle of the involute curve.

Special attention is directed to the peculiar and unusual shape of the drum.

The drum revolves from right to left. As the material is carried along it falls, of its own weight when it reaches a certain point. In falling, the material is doubled over three times during each revolutions. It has been proven by actual test that this method of mixing is more perfect than can be accomplished by any drum in which wings or deflectors do



Clover Leaf with power side loader.

(Continued on page 49)

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PLUMBING, HEATING, AND VENTILATING

Rude Plumbing & Heating Co., Carrington, N. D., have new quarters in the Grand theater.

According to Attorney General Owen of Wisconsin, a man in the plumbing business is not a contractor unless he is dealing in and selling plumbing material and supplies.

Pioneer Electric Co., Lewistown, Mont., has purchased the Crescent Electrical Supply Co., owned by W. W. Watson.

Capital Electric Co. has opened a store in Pierre, S. D., Bijou building; supplies, fixtures, lamps and general stock.

Schafter & Randall have new quarters in Waseca, Minn., near the Herald office.

J. L. Moore of the Electric Construction Co., Fairview, Mont., has sold his interest to J. G. Gennison and started in business by himself in the Times building.

Rules regarding plumbers have been prepared by Commissioner Merritt of Duluth, providing that a general license be granted at water office in which application the plumber must state that he has read the rules and will comply; must be a regularly educated plumber, must have practiced as workman three years; applicant for general license must have established business in the city, sign, display of goods, telephone, and give bond of \$1,000.

F. C. Clifton of the National Electric Co., at Albert Lea, has sold business and stock to the Minnesota Gas & Electric Co., and taken o position with it.

E. F. Monroe wire chief, N. D. Independent Telephone Co., purchased the Sanders Electric Co., of Bismarck, N. D.

J. W. Nolan has sold a half interest in the plumbing business to his brother Leo, at Balaton, Minn.

Henry Anding, New Salem, N. D., reports an increasing business in plumbing and heating during the year.

A SUBSTITUTE FOR CEMENT.

In this country, where cement is not used or hardly known, a substitute has been found that has met with rather good results when applied in exposed places, in filling crevices in water pipes, covering joints in stone floors, in fountains, and for numerous other purposes where cement would be required. The mixture is as satisfactory in water as in exposed places, but it must be allowed to become thoroughly dry before it is submerged.

The mixture is slaked lime, linseed oil, and cotton fiber. Generally a hollowed-out stone is used, although a flat, hard surface will answer, and the process is started by pouring the oil on a handful of cotton, after which the lime is dusted in. It is then kneaded until the whole is thoroughly mixed and about the consistency of dough. The more it is kneaded the better it becomes.

This compound has undergone a severe endurance test at this consulate. Two years ago the stone floor in the balcony on the north side of the house leaked in several places and rotted the woodwork supporting the balcony. The floor was finally taken up, new timber added, and the stone flags again put down. Between each stone this mixture was forced in and smoothed over the joints. It took several days for hardening, the oil spread out on the stones for about half an inch from each joint, leaving a slight mark, but the compound soon hardened like cement, and to-day the surface over the part where the stones are joined is as hard and smooth and water-tight as if cement had been used.

NEW PATENTS.

The following patents were issued this week to Minnesota and Dakota inventors, as reported by Williamson & Merchant, patent attorneys, 925-933 Metropolitan Life building, Minneapolis, Minn.: Bohan, William J., St. Paul, Minn., equipment for round houses; Edwards, Chas. and H. H. Junkin, Drayton, N. D., flexible draw bar for traction engines; La Breche, Alphonse, Jefferson, S. D., automatic fire extinguisher; Laitinen, Abel, Northland, Minn., wrench; Larsen Axel L., St. Paul; Minn., poison bottle; Lynch, Elizabeth, Minneapolis, screen; Lyng, Henry, Aurdal, Minn., grain treating machine; Mold, Julius F. and A. W., Sunrise, Minn., screening machine; Saylor, John L., Minneapolis Minn., weighing scale, Skinner, Wm. P., Garden City, Minn., adding machine; Wehner, Casper, Central City, S. D., implement for destroying revenue stamps on beer casks; Wheelock, Edwin M., Winona, Minn., wagon; Ramsey, Wm. H., Minneapolis, Minn., curtain stick machine also box holder.

CONCRETE MIXERS --- Continued.

All travelers have wide face, long hubs, and are chilled on the outside by a special process, while the inside is cored to provide for filling with wool; suitable provision is made for saturating the wool with oil; this provides even and generous lubrication, without the necessity for the close attention demanded by other methods.

the mixing, because each involute curve of the Clover Leaf Mixer in its turn, as the drum revolves, applies a positive mixing and kneading action to the entire mass.

A part of the mass falls and is doubled over from the upper involute curve while the balance falls and is doubled over from the section of the curve just below. By this motion all of the material is effectively and absolutely mixed three times each revolution.

The Clover Leaf is guaranteed by its makers and they state that it is easily adapted to all kinds of mixtures and is easily kept clean.

The frame is of special design, made of steel channel; the main shaft bearings are provided with bronze bushings, together with hard oil cups for proper lubrication.

"Clover Leaf" Mixers are made in sizes to handle 5, 7, 10 and 15 cubic feet per batch.

The folding loading platform shown in the picture is very handy for sidewalk contractors and foundation builders.

RAILROAD WILL USE AUTOMOBILES.

Transportation will be afforded the summer resorts on the east shore of Green Bay in the northern part of Door county, Wis., by the Green Bay & Western Railroad Co. and auxiliary line, the Ahnapee & Western Railway Co. General Manager F. B. Seymour has authorized a statement relative to plans which the company is formulating to supply rapid transit to the peninsula, pending the building of the proposed electric line from Sturgeon Bay north.

Automobile trucks, capable of carrying twenty passengers, will be run by the company from the railroad depot in Sturgeon Bay to Ephraim. The passenger trucks will meet all trains.

The number of visitors to the summer resorts has materially increased in recent years, and the railroad people believe much traffic, now going over a water route, can be diverted through this city to Sturgeon Bay and thence by auto conveyance to the summer resorts.

The auto trucks will be operated next summer, as soon as the resort business opens up, and will serve the territory while the proposed electric line is being built.

NEW PATENTS.

The following patents were issued last week to Minnesota and Dakota inventors, as reported by Williamson & Merchant, patent attorneys, 925-933 Metropolitan Life building, Minneapolis, Minn.; Leighton L. Brown, Minneapolis, Minn., and C. H. Patek, Brainerd, Minn., damper; John D. Grafing, Olivet, N. D., gearing; Carl J. Gustafson, Aberdeen, S. D., answering and recording telephone; Albert Hoiland, Nome, N. D., wind shield for automobile radiators; Charles R. Hronish, Knife River, N. D., hog scalding apparatus; Ole L. Kleven, Oslo, Minn., grain separator; John R. Kunzelman, Duluth, Minn., car step; James K. Lappen, Winona, Minn., machines for making tubes from fibrous materials; Adolphe C. Peterson, Minneapolis, Minn., internal combustion engine; Mark J. Phillips, Webster, S. D., road grader; Jalke Roortings, Raymond, Minn., mortising tool; Byron Schrader, White Earth, N. D., wagon jack; Peter M. Clernis, St. Paul, Minn., seal bolt.

CRUSHED BRICK FOR CONCRETE.

Since the fire of 1906 crushed brick has been used to a considerable extent in concrete mixtures for certain purposes, particularly in fireproofing, floors, etc., and preparations are now being made to use it on a larger scale. The brick contractors on the new city hall made an allowance in their bid for old brick in the foundations of the old city hall, but found the material too diverse in quality and size to be readily used. They have accordingly arranged to have it used in the concrete portions of the new building, and a crushing plant has been set up at the site to bring the old brick to suitable size for concrete.

Another sign of growing interest in this use of old brick is the recent incorporation of the National Burned Clay Concrete Co., with a capital of \$75,000, by L. A. Steiger, S. J. Hayden and W. E. Cashman. Mr. Steiger is head of a large terra cotta and sewer pipe manufacturing concern.—Rock Products.

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This is the opinion of hundreds of well known contractors, who have used "Carney's
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(Each week in this space will appear a letter from different prominent contractors telling
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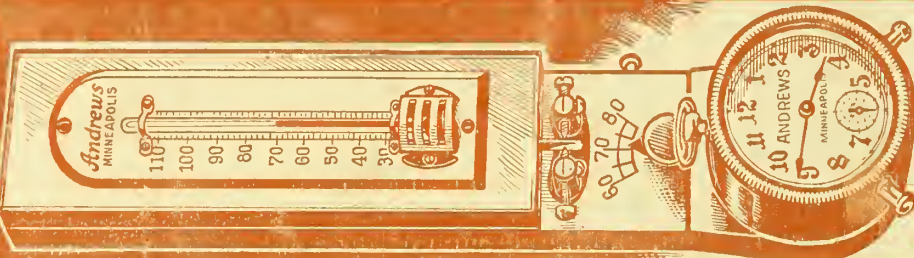
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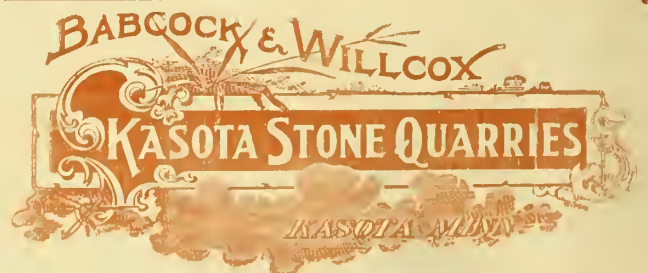
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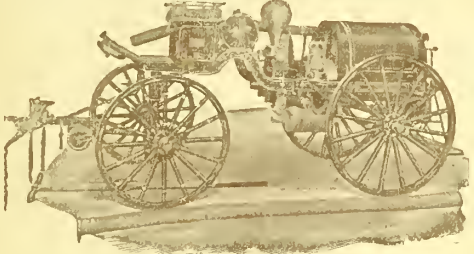
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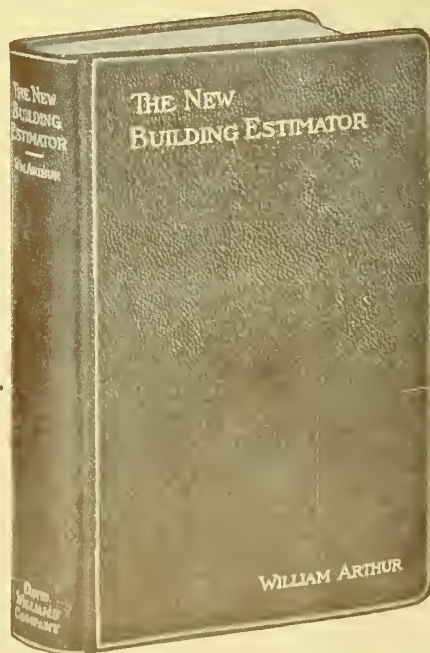
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50	Shakopee Cement Lime Manufacturing Co., St. Paul.		RADIATORS.	
1	Speakes Lime & Cement Co., Superior, Wis.	40	Associate Mfrs. Supply Co., Minneapolis.	
1	St. Paul Lime & Cement Co., St. Paul.	52	Central Supply Co., Minneapolis.	
1	Standard Salt & Cement Co., Duluth.	34	Minnesota Radiator Co., Sauk Center--Minneapolis.	
1	The Northwestern Lime Co.		REVOLVING DOORS	
	MANTELS--GRATES.		Van Kannel Revolving Door Co., St. Paul.	36
42	Drake Marble & Tile Co., St. Paul-Minneapolis.		ROOFING GRAVEL AND ASPHALT.	
51	Dunlop-Moore Co., Duluth.	36	Griffin & Boehme, St. Paul.	
42	Northwestern Marble & Tile Co.	36	H. W. Johns-Manville Co., Minneapolis-Milwaukee.	
7	Twin City Tile & Marble Co., Minneapolis.	36	Krieger-Jamar Co., Duluth.	51
	MARBLE, TILING, MOSAIC.	51	Minnesota Roofing & Cornice Works, St. Paul.	5
42	Drake Marble & Tile Co., Minneapolis-St. Paul.	1	Northwestern Lime Co., St. Paul.	
42	Dunlop-Moore, Duluth.	36	Scribner-Libby Co., St. Paul.	
46	Northwestern Marble & Tile Co.	34	Selden Roofing & Manufacturing Co., Mpls.	
7	Thomson-Williams Co., Duluth.	46	Thomson-Williams Co., Duluth.	
	METAL SHINGLES.		ROOFING--METAL.	
51	Milwaukee Corrugating Co., Milwaukee.		Badger Steel Roofing & Corrugating Co., La Crosse.	34
	METAL AND WIRE LATH.		Duluth Corrugating & Roofing Co., Duluth.	51
2	Corrugated Bar Co., St. Paul.		La Crosse Steel Roofing & Corrugating Co., La Crosse.	34
2	Ranson, Birtram W., Minneapolis.	24	St. Paul Roofing, Cornice & Ornamental Co.	
10	Johnson Jackson & Corning Co., Minneapolis-St. Paul; also Rolling Partitions.		ROOFING MATERIAL.	
1	Northwestern Lime Co., St. Paul.	17-19	Barrett Mfg. Co.	
1	St. Paul Lime & Cement Co.	2	Corrugated Bar Co., St. Paul.	
46	Thomson-Williams Co., Duluth.	51	Krieger-Jamar Co., Duluth.	
	MILLWORK.	32	John Leslie Paper Co., Minneapolis.	
32	Baxter Sash & Door Co., Duluth, Minn.	38	H. W. Johns-Manville Co., Minneapolis-Milwaukee.	
32	Osgood-Blodgett Manufacturing Co., St. Paul.		ROOFING AND SIDING--IRON AND STEEL	
	MUNICIPAL CASTINGS		Inland Steel Co., St. Paul.	2
	Davenport Machine & Foundry Co., Davenport, Ia.		RUBBER SHINGLES	
	OFFICE FURNITURE.		Standard Salt and Cement Co., Duluth, Minn.	1
51	Farnham Printing & Stationery Co., Minneapolis.		RUST-RESISTING IRON SHEETS	
	ORNAMENTAL IRON AND WIRE.		Inland Steel Co., St. Paul.	3
9	Builders Iron Works Co., St. Paul-Minneapolis.		SAFES	
6	Davenport Machine & Foundry Co., Davenport, Ia.	36	Diebold Safe & Lock Co., St. Paul.	
9	Demueles Bros., Minneapolis.	36	Heilig & Elliott Co., Minneapolis.	
9	Midway Ornamental Iron Works, St. Paul.		Herring-Hall-Marvin-Safe Co.	
6	Minneapolis Steel & Machinery Co., Mpls.		SAND AND GRAVEL.	
6	St. Paul Foundry Co., St. Paul.		Standard Salt and Cement Co., Duluth, Minn.	1
	PAINTS, FILLERS, ETC.		SEWER PIPE AND DRAIN TILE.	
6	Ricketson Mineral Paint Works, Milwaukee.	1	Ingalls Stone Co., Bedford, Ind.	
	PACKINGS AND HOSE	42	Iowa Sewer Pipe & Tile Co., Des Moines.	
	H. W. Johns-Manville Co., Minneapolis-Milwaukee.	1	Northwestern Lime Co., St. Paul.	
36		10	Plymouth Clay Products Co.	
	PAVEMENT.	42	Red Wing Sewer Pipe Co., Red Wing.	
8	Barber Asphalt Paving Co., Des Moines, Ia.	1	Standard Salt and Cement Co., Duluth, Minn.	
17-19	Barrett Mfg. Co.		SHEETS--IRON AND STEEL	
	PIPE AND BOILER COVERING		Inland Steel Co., St. Paul.	2
	H. W. Johns-Manville Co., Minneapolis-Milwaukee.		SLATE BLACKBOARDS.	
36			Twin City Tile & Marble Co., Minneapolis.	7
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			STEEL--BARS	
			Inland Steel Co., St. Paul.	2
			Minneapolis Steel & Machinery Co., Mpls.	6
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			Babcock & Wilcox, Kasota, Minn.	52
			Biesanz Stone Co., Winona, Minn.	48
			Also Building Material, Gravel for Roofing, Sand and Gravel.	
			Breen Stone Co., Kasota, Minn.	48
			Edw. Edinger Co., Cedar Rapids, Ia.	48
			Ingalls Stone Co., Bedford, Ind.	1
			Kettle River Co., Minneapolis.	48
			Duluth Cut Stone Co., Duluth, Minn.	51
			Mantorville Stone Co., Mantorville, Minn.	48
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			Pioneer Granite Co., St. Cloud, Minn.	48
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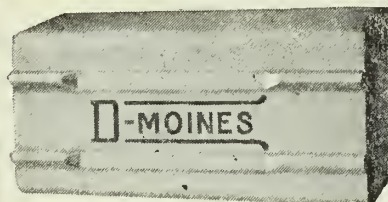
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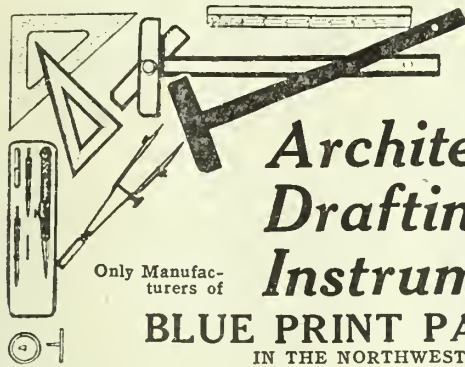
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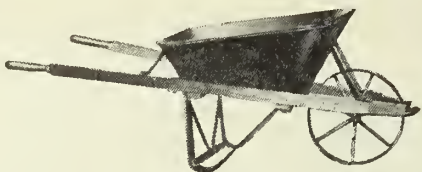
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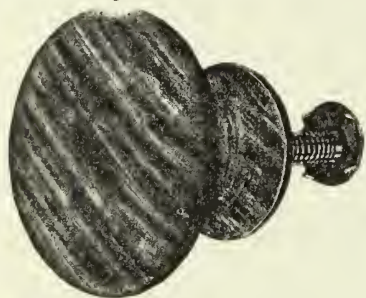
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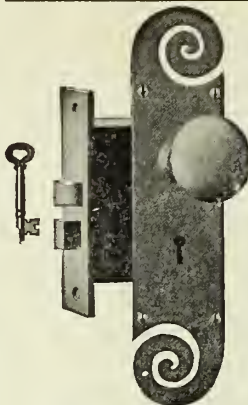
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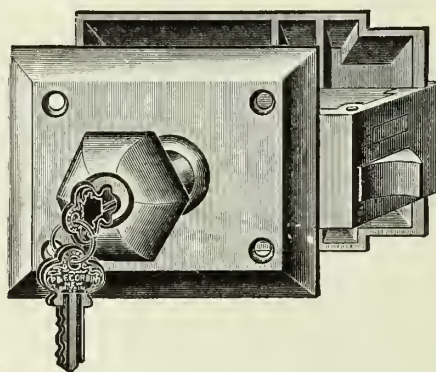
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VOLUME XLVII.

SATURDAY, DECEMBER 27, 1913

NUMBER 4

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EDITORIAL

O. L. COLBURN, Editor

TWINS HELP EACH OTHER.

It was neighborly of St. Paul to send over to Minneapolis for advice on appropriating money for a testing plant in the building inspector's office. It was quite proper and commendable for Minneapolis to respond at once and heartily. Building Inspector Houghton, of Minneapolis, invited by Building Inspector Van Ornum, of St. Paul, went over one evening last week, and addressed the council on Minneapolis' experience with her testing plant. The St. Paul city fathers had decided not to buy one and eliminated the item from the budget. Following Mr. Houghton's forceful talk, backed by experience, the council replaced the item and \$8,200 is now available for a testing plant. Naturally Building Inspector Van Ornum feels grateful for he has added a most necessary improvement to his department. He has expressed his gratitude in a letter to Mr. Houghton which will be worthy of a prominent place among his Christmas remembrances of 1913.

LICENSING OF CONTRACTORS.

Eastward of us licensing of contractors seems to be gaining ground. In Illinois there is a new law for licensing mason contractors. Chicago will have to have a commission of three men with the building commissioner ex-officio chairman, a practical mason and a practical architect, to examine candidates for licenses. Engineering Record quotes Building Commissioner Ericsson of Chicago as saying that there are 600 mason contractors in Chicago and a fee of \$100 each is being considered. He says most of the building violations handled by the court are caused by contractors who, making the owners believe that they can alter or construct their buildings any way they see fit, rush their work through to completion and get their payment immediately thereafter. When the case is thrown into court the judge on the bench can hold only the owner.

In Boston, where one may expect thorough law-making and system, the granting of licenses to builders, by the board of examiners in the building department of Boston, Mass., will be under three classifications, as follows:

(a) Charge or control of the construction of first-class buildings; (b) charge or control of the construction or alteration of second-class buildings; (c) charge or control of the construction or alteration of third-class buildings; (d) charge or control of the moving or shoring of buildings or structures; (e) charge or control of the tearing down of buildings or structures.

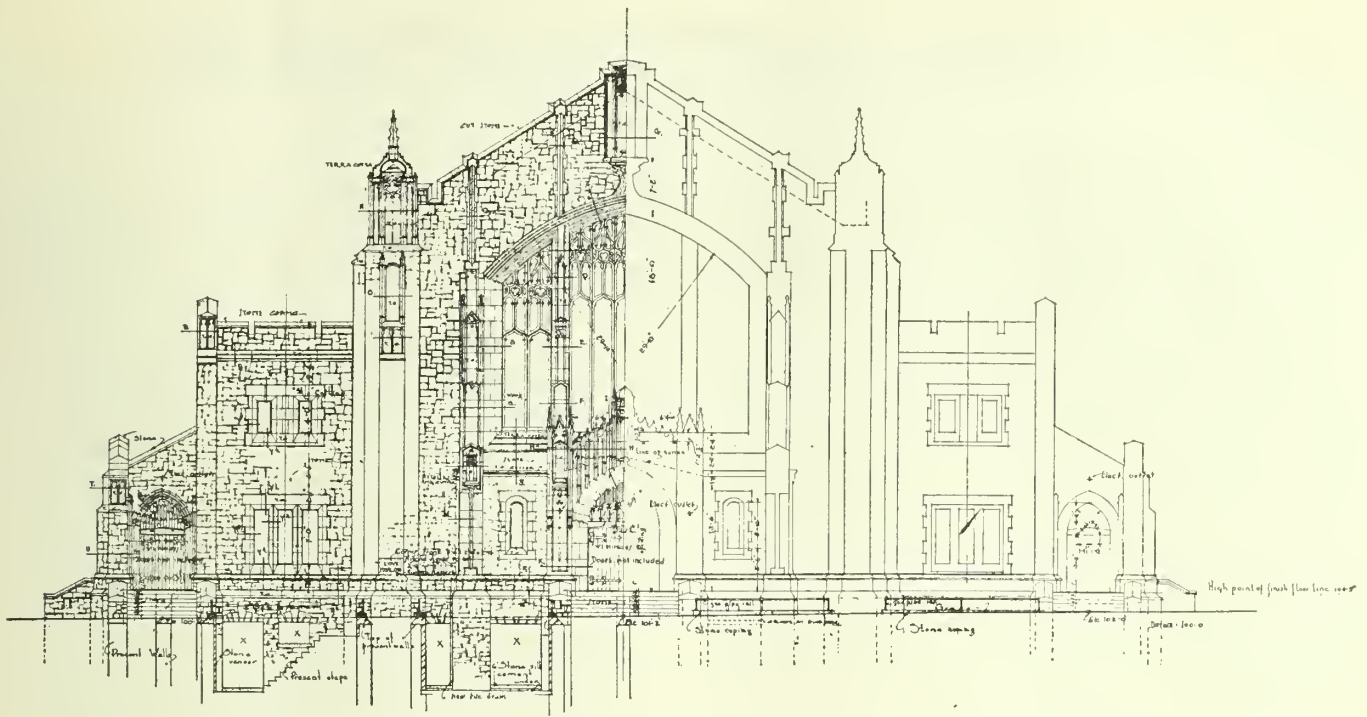
Engineering News says: According to the November "monthly letter" of the secretary of the Master Builders' Association, Building Commission Everett states that he understands that a man licensed under class (a) may take charge of work under classes (b) and (c), and one licensed under (b) may have charge of work under class (c). In his judgment, in many cases a man with a class (a) license might have charge of the work of classes (d) and (e). The commissioner also judges "that the usual practice would be to appoint one man who should be in control from the beginning to the end of any complete piece of work. If, for the convenience of the owner or builder, it is desirable to divide the work, say, by making the foundations, the steel frame, and the remainder of the work, each a part by itself, he may place a qualified and licensed man in charge of the foundations, another in charge of the erection of the steel frame, and still another in charge of the remainder of the work. The commissioner holds that the person in charge may, in his discretion, leave the work, when he judges it safe to do so, and he holds that subcontractors do not need to have a licensed man in charge if the general contractor has such. He says, "I do not understand that each subdivision of the work shall be in charge of a licensed person, but that it will be the duty of the person in charge of the whole work to see that the several parts are performed in a safe and proper manner."

A WORD OF WARNING ON GRANDSTANDS.

While the open season for grandstand operations is not near, in this part of the country, it is timely to say a word on the subject. With the arrival of that promising youngster, the New Year of 1914, no doubt plans will begin to take shape for such construction. And there are warning reports of accidents from the South. Engineering Record, commenting on these, says: "The annual crop of grandstand failures is now being harvested. One man was killed and several seriously injured two weeks ago at Tulsa, Okla., when a dilapidated stand went down with baseball fans. Later the football rooters at Greencastle, Ind., were too enthusiastic as the rival teams trotted onto the field and the swaying of the crowd is said to have been the immediate cause of the collapse of a grandstand which injured 100 persons. Admonitions can not be given too often regarding the dangers from deterioration, inadequate strength or lack of rigidity in structures stressed to the limit but a few times a year. Careful inspection by competent specialists is necessary on temporary as well as on permanent structures, while temporary stands, the failure record teaches, require especially careful examination and checking before their use is allowed.

ABANDONS WOODEN BRIDGES.

Missoula county, Mont., decided to quit building plank bridges over irrigation ditches where they cross the public highways. Steel bridges will be used from now on, with concrete abutments. These structures are said to be practically indestructible, while the county has had to replace the wooden bridges every few years.



End View of the Fifth Church of Christ, Scientist, Minneapolis. Kees & Colburn, Architects, Minneapolis.

CHRISTMAS PARTY, BUILDERS' EXCHANGE OF ST. PAUL.

The Builders' Exchange of St. Paul gave a Christmas party for the members of that organization on Monday evening, Dec. 22d. The spirit of the Christmas season was carried out by having erected in the meeting room of the Exchange a gorgeous Christmas tree, appropriately trimmed and lighted with miniature electric lamps. Santa Claus was also in evidence, Charles Villaume taking the part of that jolly character. The earlier part of the evening was spent viewing the new rooms adjoining the Exchange which are being fitted up for exhibit purposes. This was followed by a "smoker" and a general get-together good time for about an hour, Santa Claus doing the honors of passing cigars and making himself generally agreeable. Following this, Santa Claus announced that he had good news for many of the members in the form of awards of contracts for various buildings to be erected in St. Paul during the year 1914. He then produced from his pack a bundle of uniform contract blanks, appropriately inscribed, whereupon he read off the names and handed the contracts to the various members, some of them being as follows: Mr. F. C. Norlander was awarded contract for remodeling all buildings in connection with the widening of Robert st.; Mr. Olaf Swenson was awarded the contract for the new historical building; Deeks, Deeks & Smith, the contract for the new Union depot; C. Ash & Co., the contract for the new public library; Oace & Amlee the contract for the Huron, S. D., church; Cameron & Co., the contract for all buildings at the Schmidt Brewing Co.'s plant; F. J. Romer Construction Co., contract for all buildings at the Hamm Brewing Co.'s plant; Raymer Hardware Co. received the contract for all hardware to be used in the widening of Robert st.; John H. Hoffman, the contract for the Capital National Bank building; Chas. Skooglund, the contract for the St. Paul Athletic Club building; Denny Hogan, the contract for all of the crushed stone to be used in St. Paul during the year 1914; Northwestern Lime Co., the contract for all the wall board to be used in St. Paul during the year 1914.

In addition to the above, there were a number of other stunts of similar character, some of them being as follows: Mr. P. M. Hennessy received the nomination for mayor of St. Paul under the new commission form of government; Mr. J. W. L. Corning, a guarantee that no prison-made brick would be used in the erection of state buildings during the year 1914. To Tim. Reardon, the dean of the building industry in St. Paul, the wishes of members of the exchange that he might have many Merry Christmases. Ed. Finck was presented with a document giving him a clear title to the position of ex-second vice president. Mr. John A. Seeger was presented with a "check" for two million, five hundred thousand dollars, in settlement for all refrigerator patent suits.

Following this Santa Claus presented to each one present

a stocking filled with good things and a toy, all fixed up in regulation Santa Claus style.

President Romer then called the meeting to order and introduced Mr. J. W. L. Corning as the principal spokesman of the evening. Mr. Corning in his remarks accused Secretary Williams of all manner of things and wound up by presenting him, in the name of the members of the Builders' Exchange of St. Paul, with a gold watch and chain.

Various members were then called upon for remarks appropriate to the occasion, some of those speaking being Mr. C. P. Smith, Robert Beier, O. Lampland, H. T. Cameron, D. E. O'Connell, W. D. Stewart, Chas. A. Fowble, Mr. Nimis of New York City, John D. Roberts, H. J. Langen, E. G. Campbell, F. S. Blodgett, Wm. M. Burns, John A. Seeger, Olaf Swenson and F. M. Cady.

Everyone present voted the party a splendid success and expressed a hope that it would be made an annual feature. Upward of one hundred members were present.

BUILDERS' EXCHANGE ELECTION.

The following candidates have been nominated to be voted on at the annual election of the Minneapolis Builders' Exchange, Jan. 6.; president, M. Schumacher, Walter Thorp; 1st vice president, John McDonald, J. B. Martin; 2d vice president, Harvey B. Smith, Jas. H. Brown; treasurer, Ernest F. Smith, Frank Tozer; directors for three years, (vote for three), E. H. Cobb, Tony Hedborg, J. L. Robinson, John Hopkin, B. W. Smith, J. C. Van Dorn; sergeant-at-arms, L. M. Osborn, Chas. Fisher; committee on complaints, (vote for five), W. O. Hartig, John Hernlund, Harold Johnson, Jas. Leck, C. F. Splady, J. N. Smith, Aaron Carlson, Albert Malone, Earl Baker, F. W. Currier.

MILES CITY BUILDERS' EXCHANGE ELECTS.

The Builders' and Traders' Exchange of Miles City, Mont., at its meeting Tuesday night elected the following: J. B. Morrison, president; James Reagan, vice president; James Elzea, treasurer; R. H. Deebach, secretary; W. H. Reed, sergeant-at-arms; E. Ellsworth, trustee; committee on entertainment, C. J. Weston, Fred Clearman, George Harrigan; committee on complaints, L. A. Clearman, A. Berg, W. H. Reed and W. O. Mitchell.

BUILDERS' EXCHANGE NOMINATES

Officers have been nominated by the Milwaukee Builders' and Traders' Exchange: President, W. Rediske, T. P. Dever; first vice president, B. Hibbard, E. Tiefenthaler; second vice president, A. Maag, H. Grunwald; secretary, W. Kummerlein, P. Biersach; treasurer, A. Hennecke, J. Dalhman. The following directors will be voted on: J. Quinn, H. Ferge, W. Tubesing, H. Andrae, H. Schmidt, F. Schmidt, M. Fridstein, H. Franke.

A Proper Method of Advertising

Address by P. B. Lessing Before Iowa Clay Products Manufacturers' Meeting at Des Moines, Iowa, on How It Can be Used to Increase the Individual Business of the Manufacturer.

In the old days men used to go about crying that their businesses were peculiar and could not be advertised. Many of them sincerely believed this to be true.

This was because they did not understand advertising. They looked on it as a subtle, mysterious force, powerful as a high voltage dynamo when applied, but possessing an affinity only for certain lines of business.

Gradually there came a clearer understanding.

Business men began to see that advertising is nothing but salesmanship on paper. And salesmanship is making the other man see your proposition as you see it. So, one by one, all these "peculiar" businesses that "could not be advertised," began to fall in line and too they found that advertising, so far from being useless, became a veritable elixir of life.

Even churches and undertakers advertised. Today about the only man who cannot profitably advertise is the burglar.

Surely this great vital force which has proved so valuable for others can be turned to good account by you brick and tile manufacturers. When you go out to see your customers face to face you find many things to say to them. It is common business economy to say these same things on paper and talk to thousands of prospects at a time.

You are now considering the problem of advertising as a joint association to increase the use of tile for the general good of all. You are wondering if it will pay. I tell you it will pay and in proof of my assertion I cite you actual instances where joint advertising of this kind has paid big profits to the members of the association which conducted this kind of a campaign.

Do you know the story of the Cypress Association of Louisiana? This association has spent thousands of dollars popularizing the use of cypress as a building material and the results have entirely justified the move.

Before this advertising started cypress was handled in Des Moines by only one lumber dealer. Today every dealer handles it as one of his staple lines. Advertising has created a demand for cypress.

Another concrete instance. You think of red cedar shingles as being very high grade. This is because the California mill owners launched a campaign to tell the public the story of red cedar quality.

Numberless instances of associative advertising might be cited but these two will show that the plan has actually worked out.

On the other hand, the tile industry is showing a concrete example of business lost through failure to advertise. Drive through the country in any direction and you will find a dozen stave silos to one that is built of brick or tile. You will admit this is a fact and yet I do not think any of you are willing to admit this condition is due to any superior merit on the part of the stave silo. The preponderance of stave silos is due to the extensive advertising and the high grade salesmanship employed by these people.

Your advertising will serve a two-fold purpose. It will create sales among the ultimate consumers—the farmers and others—and it will assist in producing sales among dealers. By this latter I mean that it will create sales above the actual normal selling value of the advertisement. I shall explain this by an instance.

Some time ago the Saturday Evening Post carried a two page ad. in colors, advertising Lucky Strike tobacco. The cost of this ad. was \$11,000 for one insertion. At ten cents a can the company would have to sell 110,000 cans to take in gross as much money as they paid out for this ad. Figuring a million circulation this would mean one sale out of each nine purchasers of the Post. I don't believe the tobacco company ever expected to do this, and yet I believe the ad. paid them. Let me tell you why.

The appearance of this advertisement acted as a tremendous lever in securing orders from dealers and jobbers. Each salesman had an advance proof of this ad. before it was published and when he laid it down on the dealer's desk the effect was immense. The dealer in his mind's eye could see the customers filing into his store and asking for Lucky Strike.

I venture to say that this advertisement paid out but not through immediate consumer demand. It caused sales among dealers because of the prestige it created for the company which inserted the ad.

Advertising has for its second purpose the infusion of

genuine interest in the mind of the customer. This is the better purpose and the one I recommend you to have primarily in mind when you advertise your brick and tile. Sensational splurge advertising may stock a dealer but if it does not move the goods quickly you will have trouble in getting a re-order from the dealer. Your sale is not completed until the brick or tile are in the hands of the farmer.

Advertising will greatly increase your sales but the campaign must be carefully planned. Otherwise you will spend your money without getting the returns you have a right to expect.

The advertising of the association, of course, should be along general lines. It should tell the benefits of tiling farms and show the advantages of brick and tile for various purposes. Every person who answers an advertisement of the association should be sent a book and other follow-up literature. An arrangement should also be made by which all dealers within the selling zone in which the inquirer is located shall be given the inquirer's name so they may work on him.

So much for the advertising of the association. For the advertising of individual manufacturers different tactics are recommended.

The first suggestion I would make would be for you to concentrate on some one article of your line and make that a leader to carry your entire line. If you attempt to advertise your entire line you will scatter your appropriation over so wide an area that no one article will receive enough emphasis to be impressed on the mind of the prospect. A shotgun discharge will cover a lot of territory but you hunt bear with a rifle.

When your advertising of one article, coupled with intelligent sales work has sold the dealer and interested the farmer, start your dealers on other lines. Remind them that you have proved your ability to market drain tile for them and that therefore they will make no mistake if they let you stock them with a supply of building blocks, silo blocks or whatever else you may be manufacturing.

The suggestion of specialization is not a mere theory of mine. It has been proved out in many instances. Among others I cite as typical the experience of a mid-western shoe company.

This company starting on a small appropriation, specialized all its advertising and sales effort on its work shoe. When this had been thoroughly established the consumer confidence thus secured made it easy for them to sell the dress shoes and other shoes of their line.

Last year the company sold more than a half million pairs of the work shoe alone.

ENTERTAINS CHRISTMAS CROWDS.

A miniature installation of a gravity conveyor by the Minnesota Manufacturers' Association of North St. Paul, Minn., was a Christmas exhibit in the window of the candy store of Geo. J. Smith, Nicollet near 7th. Small boxes of candy were elevated several stories in miniature, sent down a spiral slide to rollers which carried them around back to the elevator which lifted them up again. The window was surrounded by crowds constantly, and many thousand people are now acquainted with the gravity conveyor who never knew what it was before. It proved one of the most interesting displays of the Christmas season on Minneapolis' thoroughfare.

QUESTIONS AND ANSWERS RELATING TO MODERN AUTOMOBILE DESIGN, CONSTRUCTION AND REPAIR.

By Victor W. Page, M. E.

This practical treatise consists of a series of thirty-six lessons, covering with nearly 2,000 questions and their answers—the automobile, its construction, operation and repair. The subject-matter is absolutely correct and explained in simple language. If you can't answer all of the following questions, you need this work. The answers to these and nearly 2,000 more are to be found in its pages.

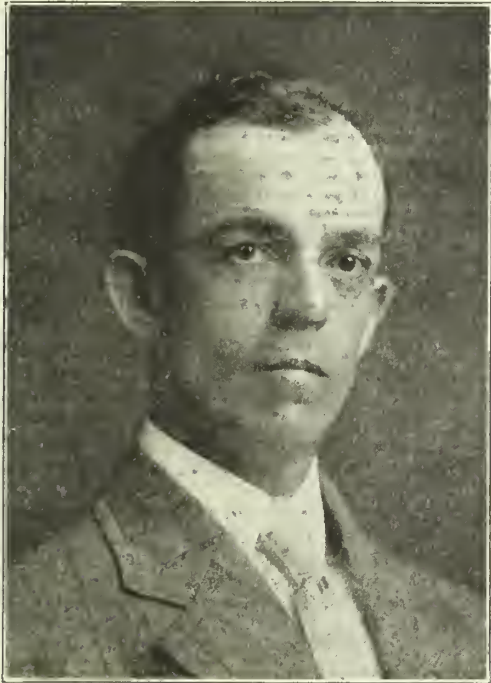
Give the name of all important parts of an automobile and describe their functions. Describe action of latest types of kerosene carburetors. What is the difference between a "double" ignition system and a "dual" ignition system? Name parts of an induction coil? How are valves timed? What is an electric motor starter and how does it work? What are advantages of worm drive gearing? Name all important types of ball and roller bearings. Cloth, 600 pages, 350 illustrations, \$1.50 net, N. W. Henley Publishing Co., New York City, or The Improvement Bulletin.

THREE CEMENT PROGRESSIVES

Trio of Young Business Men Who Plant the Universal Banner in the Northwest.

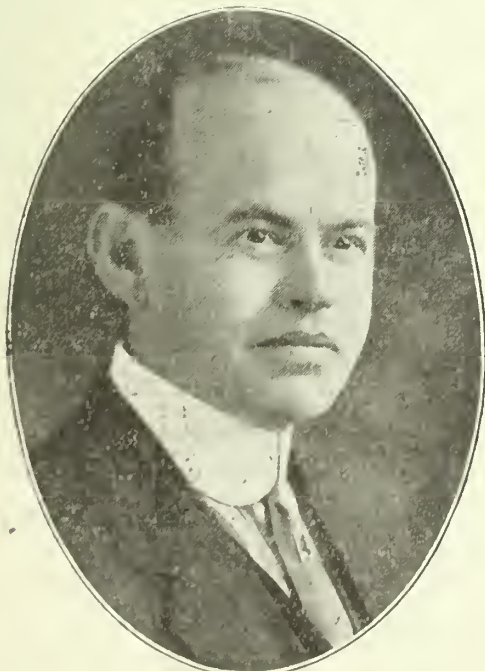
In a recent issue of the Mississippi Valley Lumberman, of Minneapolis, the local staff of the Universal Portland Cement Co. was the subject of the following interesting article:

This trio of Universal Portland Cement Co. men consists of the company's northwest sales agent, John C. Van Doorn, and two of his right hand men Ernest S. Macgowan and David



John C. Van Doorn.

S. Day. All three of these men are staunch advocates of the permanent type of construction and of course recommend Universal cement as a basis for this construction. This company has done much for the promotion of general education along these lines and has sent out instructive literature to prospective builders in addition to the regular issuance and distribution of the "Concrete News" to farmers and other users of cement pointing out the value of permanent construction on the farm.



Ernest S. Macgowan.

John C. Van Doorn, in active charge of the Minneapolis office and northwest sales, has been in the building material business for seventeen years or more, having spent ten years with the Universal Portland Cement Co. He was formerly the St. Louis agent but when the Minneapolis office was established, he was removed to the new territory, taking charge of an office employing about three persons. Under his guidance, however, the business has grown rapidly and a force in excess of thirty-five persons is now employed. Mr. Van Doorn's particular weakness is concrete highways, and this hobby is developed in his nature to the extent that the Minneapolis office has taken the lead in pushing such permanent highway construction as concrete roadway, concrete bridges and culverts. His home and his business are his chief ideals and he is the complete master of these ideals. In his business he has woven around him a sales and office force that does credit to the standard of product that they handle. Personally he is careful and conservative and resourceful to the extent that he never encounters responsibilities or conditions that he cannot master.

Ernest S. Macgowan, stands at Mr. Van Doorn's right hand. He is a man who has adapted himself very readily to the cement business and in his study of details has acquired a knowledge that makes him a valuable man and has earned him the title of being "dippy" over concrete construc-



David S. Day.

tion. He has made a particular study of concrete paving problems and has a store of knowledge which places him in the expert class. He has been connected with the Universal Portland Cement Co. since the establishment of its Minneapolis office, prior to which time he had been in the farm machinery business and later in the car coupler business. As a promoter of good roads he has done much to advance the cause in both this section and other parts of the territory covered from this office. He is a photographer of more or less renown and has employed this achievement to good advantage in connection with his beloved topic, "Concrete Highways."

David S. Day, another of Mr. Van Doorn's standbys, has been with the company for a number of years, although only a comparatively short time in the northwest territory. He has charge of the Twin City sales and like his business associates grows more enthusiastic each year over cement and its possibilities. During the course of his connection with the company he has traveled in every district covered by their sales forces, having originally been in that territory covered by the Chicago office, later in Pittsburgh, and then his northwest connection. Loyalty to the company by which he is employed is a prominent characteristic of his nature but he explained this by saying that "Such is the case with every employee of the concern."

PERSONAL AND GENERAL NEWS

Doings of the Northwest this Week Boiled Down for Busy Readers

PERSONAL AND GENERAL.

Randolph J. Moulton, of Moulton & Evans, elevator builders, Corn Exchange, Minneapolis, was badly injured last week. An automobile struck him as he was getting on a street car. His condition is still critical.

Michael Sinnott, a pioneer contractor of the Canadian west, died recently at the Victoria Hospital, after a very short illness. Mr. Sinnott had lived in Winnipeg for thirty-six years, and built the first block pavement in the city, on N. Main st., in 1883.

The Raymer Hardware Co., of St. Paul, will have new and larger quarters, having leased the Peterson block, 56-62 E. 5th for 20 years. It will be remodeled at a cost of \$15,000 and the company will have one of the largest and most modern hardware establishments in the Northwest. The progress of the Raymer Hardware Co. has been rapid.

P. N. Peterson, of Peterson Granite Co., St. Paul, announced that a new plant will be built for the company in the Midway district.

A. J. Garner, of Madison, S. D., contractor for the new buildings at the training school, had a narrow escape recently. While at work on the third floor scaffold the derrick gave way and knocked Mr. Garner to the ground, 32 feet below. Fortunately he alighted on his feet and escaped with badly bruised and fractured ankles and a broken arm. It was thought for a time that he had received serious internal injuries, but at last reports was getting well rapidly.

Thorwald Thorson, of Forest City, Iowa, has formed a partnership with R. M. Weblemoe, of Northwood, and they will do contracting and building. They will build an office and a shop in Forest City. Mr. Thorson has furnished the plans for the recent new buildings in Forest City and also had the building contracts on several residences and on the new electric light plant. Mr. Weblemoe has been doing cement bridge building and this fall completed the largest cement bridge in Worth county.

P. C. Richardson, formerly a Minneapolis contractor, died at his suburban home Dec. 20, aged 73.

Seymour Bradley, a former De Pere, Wis., contractor, but recently of Seattle, died Dec. 17, aged 75.

Henry W. Willis, of Langford, N. D., has applied for a patent on a grain door of which he has completed a model.

William N. Connor, manager of the roofing and paper department of W. S. Nott & Co., died Dec. 12, aged 43.

J. E. Franks, of Bathgate, N. D., recently purchased the interest of his partner, Archie Gardner. Gardner & Franks, contractors, have been doing business in the vicinity of Bathgate for some time and Mr. Franks is well known there.

ARCHITECTS AND ENGINEERS.

J. C. Jensen, auditor of Wantonwan county, announced that bids would be received till Jan 5th, for the resurvey of the township of St. James. Successful bidder will be required to furnish bond for the amount of the bid to be approved of by the said board of county commissioners, and conditioned that the party shall faithfully perform and fulfill his contract and pay all damages which may accrue by the reason of the failure to complete the work as required in the contract.

O. L. Dent, civil engineer of Carlton, Minn., who has been engaged in bridge and drainage work, was in the city, returning to Carlton from a trip east.

E. K. Savage, engineer, Windom, Minn., was in the Twin Cities on business this week.

E. L. Higgins, civil engineer on the Great Northern branch from Plentywood, recently spent a short vacation at his home in Hutchinson, Minn.

City Engineer Thomas has been preparing data for new electric light rates in Minot, S. D.

W. F. Rosenwald, engineer for the highway commission, who has charge of all work in the western and southern divisions of the state, has returned to St. Paul.

One city street engineer, in place of ward commissioners, is recommended by the Real Estate Board of Minneapolis.

Prof. E. J. McCaustland, of the faculty of the University of Washington, has been appointed by the county commissioners as consulting engineer for the construction of \$3,000,000 worth of county roads in King county, (Seattle.)

T. J. Vaughan Rhys has examined for J. W. Hart and W. McDonald, of Vancouver, their holdings of coal lands on the Kitseguegla river, twelve miles from Skeena crossing, and has recommended the development of the ground by diamond drilling.

The Engineers' society of the University of Minnesota

RIGHT TEMPERATURE IN THE HOME

WITH this perfect device you can determine exactly the inside temperature regardless of outdoor conditions or variations—whether 20 below or 40 above. All adjustments are made instantly from the thermostat which has its place out he wall in the living room.

The "MINNEAPOLIS" HEAT REGULATOR

With 8-day Clock Time Attachment

The clock attachment enables one to secure automatically and silently a change of temperature at any set hour. Model No. 60 (same as illustration) shows 8-day clock.

The "Minneapolis" is the "original" and "best" heat regulator—the standard for over 30 years.

Renders a service each year worth many times its cost. Saves many steps. Prevents extremes of temperature. Insures less fuel. Used with any heating plant. Sold and installed by heating trade under positive guarantee of satisfaction. Write for booklet.

MINNEAPOLIS HEAT 2768 4th Av. S., Minneapolis
REGULATOR CO. St. Paul Office, 140 Endicott Arcade



met Saturday in the auditorium of the main engineering building. A buffet lunch was followed by an illustrated lecture by Frederick W. Mann, head of the department of architecture, on "The Evolution of Architectural Construction."

James H. Burner of Mather & Burner, architect, Minneapolis, has gone to Sheboygan, Wis., for the holidays and will return about Jan. 5th.

T. R. Kimball of Omaha was elected first vice president of the American Institute of Architects.

Adna Dobson, city engineer, of Lincoln, Neb., addressed a meeting of St. Paul, Neb. citizens on paving last week.

The United States civil service commission announces an open competitive examination for inspector of mechanical and electrical engineering, for men only, on Jan. 21, 22, and 23, 1914, at the places mentioned in the list printed hereon. From the register of eligibles resulting from this examination certifications will be made to fill a vacancy in this position, at \$2,000 a year, in the office of the supervising architect of the treasury.

R. M. Cooley arrived at Princeton, Minn., on Tuesday evening from St. Paul to take the place of R. S. Chapman, resigned, as deputy state engineer for Mille Lacs and Kanabec counties.

W. L. Alban, until recently of the firm of Alban & Hausler, architects, St. Paul, announces that G. L. Lockhart will be associated with him under the firm name of Alban & Lockhart, and that the offices will remain in 407-9 Chamber of Commerce. Mr. Lockhart was formerly an architect of Nashville, Tenn. Recently he has been a writer for architectural publications.

J. H. Thomas, chief engineer, Fairmont & Veblen road, has returned to Veblen after several weeks in Minneapolis.

BRICK AND TILE NEWS

Machinery is on the way for the new Yankton Brick & Tile Co. plant, Yankton, S. D. The capacity will be 20,000 a day; two 100-h. p. boilers and a Corliss engine; will employ twenty men. Officers: W. J. Pantle, president; D. B. Gurney, vice president; J. A. Danforth, treasurer; Edward C. Kloppe, secretary and manager.

William Fricke, pioneer brick manufacturer, of Manitowoc, died Dec. 15. He was 69 and had been in the brick business for fifty years. His sons, Gustave and Irwin, have been managing the business for a number of years.

During a recent ten-day period the Hutchison (Minn.) Brick & Tile Works received orders for eleven cars of tile to be shipped to farmers for the earliest possible spring work.

Contractor Nels Jensen, of Hutchinson, Minn., has booked to date thirty miles of tile to be laid in 1914; and there are other tile layers in that vicinity.

Chas. McHose has the foundation in for a tile factory building at Maxwell, Iowa.

C. P. Slater is manager of the Slater Brick Co. plants at Fairview and Miles City, Mont.

Barium (Minn.) Brick Co. has begun the manufacture of floor tiling and other products, following the installation of a repress and other equipment.

CONSTRUCTION AND CONTRACT NEWS

OF SPECIAL VALUE TO ENGINEERS, CONTRACTORS, BUILDERS AND MANUFACTURERS

MINNEAPOLIS, MINN.

Office: 912 Lumber Exchange. Phones: N.W. Main 3902; T.S. 2194.
Please telephone news not later than Wednesday.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

James Husak, 601 22d av. NE., 2-story brick veneer store and flat building; Peter Giguere & Son, builders.....	4,500
Joe Chesler, 626 Girard av. N., 2-story frame duplex.....	3,500
F. E. Graves, 2524-26 Nicollet av., 1-story frame stores (2); F. E. Graves, builder.....	2,000
Carl Newstrom, 3921 5th av. S., 1½-story frame dwl.....	3,000
Peter H. Faber, 2639 N. Oliver av., 2-story frame duplex; Matt J. Theis, builder.....	4,500
Henry A. Fritz, 819 20th av. N., 1-story brick store; E. F. Wandersee, builder.....	3,500
F. P. Chamberlain, 2206 N. 6th st., 2-story frame duplex; G. G. Chamberlain, builder.....	3,500
Marien Stevens, 2505-07 N. Fremont av.; Stevens & Co., builders.....	1,900
George Dredge, 408 W. Minnehaha blvd., 2-story plaster veneer dwl., Carlstad Bros., builders.....	8,500
Anders Sorensen, 2606 27th av. S., 2-story plaster veneer duplex.....	2,500
Chas. E. Newquist, 79 Malcolm av. SE., interior finishing; Minneapolis Manufacturing Co., 331-39 Taylor st. NE., 1-story frame warehouse.....	1,100
Morris I. Kaplan, 105 Central av. NE., finishing off flat on 2d floor, Peter C. Giguere & Son, builders.....	1,000
J. T. Kane, 3310 N. Bryant av., 1½-story plaster veneer dwl.....	1,500
Judson Memorial Baptist Church, Harriet av. and 41st st., concrete foundation for new church; F. N. Hegg, builder.....	1,800
R. E. Wetzel, 2718 Chicago av., repairs and alterations and addition to frame dwl.....	2,600
John F. Baker, 3407 E. 41st st., 1½-story frame dwl.....	1,000
A. T. Kullberg, 1003 N. Sheridan av., 1½-story plaster veneer dwl.; G. W. Spriesterbach, builder.....	1,200
Pure Oil Co., 1300 S. 1st st., 1-story brick and reinforced concrete garage.....	4,200
Blanche H. Jones, 4421 S. Washburn av., 1½-story plaster veneer dwl.....	1,200
Erick Holmlund, 4048 Pleasant av., 1½-story plaster veneer and shingle veneer dwl.....	2,000
Fred Balow, 2027 26th av. N., 1½-story plaster veneer dwl.....	3,000
C. H. Fagerstrom, 3616 16th av. S., 1½-story plaster veneer dwl.....	1,550
Metal Shelter Co., 1021 Hennepin av., 2-story metal office building and 1-story metal garage.....	3,500
Timothy I. Ryan, 115-17 2d av. S., 1-story brick store.....	1,065
Mrs. Josephine Rayner, 1929 University av. SE., 1-story plaster veneer dwl.; Mr. James, builder.....	1,800
Herbert S. Marshall, 4215 S. Drew av., 1-story frame dwl.; Carl Lindquist, builder.....	1,000
L. B. Byard, 5051 S. Aldrich av., 2-story frame dwl.....	2,215
	4,500

Kirby T. Snyder, architect, 749-50 Plymouth building, has plans in progress for the big school building at Laurens, Iowa; 3-story, brick and reinforced concrete, fireproof; 74x132, concrete foundation, press brick and cut stone exterior, oak interior finish, wood and composition floors, hard finish plaster, steel stairs, structural and ornamental iron, Barrett specification roof, slate blackboards, laboratory tables, manual training and domestic science equipment, desks and lockers, Wilson sanitary wardrobes, plumbing, steam heating, fan ventilation, d. s. and prism glass, plans complete about February 1, 1914; address inquiries to architect; cost \$50,000; owner, Consolidated Independent School District of Laurens, Iowa; F. C. Gilchrist, president, Laurens.

Kirby T. Snyder, architect, Plymouth building, has been engaged to prepare plans for a 2-story and basement church building for the Christian Congregation of Fairmont, Minn.; concrete foundation, press brick and stucco exterior; birch interior finish; wood and cement floors, gymnasium and dining rooms, kitchen and toilet rooms in basement, auditorium and S. S. rooms first floor; balcony, rear of 2d floor to be fitted up modern for 5-room suite for pastor's residence; press brick, cut stone, structural steel, hollow tile and common brick, hard plaster, art glass, electric wiring and fixtures, pews, pipe organ, baptistry pews, composition roof, skylights, furnace heat, plumbing; plans in progress; Walter R. Burton, pastor, Fairmont; cost \$10,000.

A modern residence at Wilmette, Ill., suburb of Chicago, will be built with Minneapolis material from plans by Glenn L. Saxton, architect, Plymouth building, for Lucius A. Bowman, brother of Will J. Bowman, Minneapolis; general contract to J. O. Wordell, Minneapolis; hot water heat, Mueller boiler, standard plumbing, cost \$5,000; sign will be erected on lot giving list of all sub-contractors, contractors, architects and materials with the display line, "Made in Minneapolis;" sign will be seven feet by sixty, and will remain during construction of building.

Kirby T. Snyder, architect, Plymouth building, has plans completed for a new high school building at Grenada, Minn.; 84x112.4; concrete foundation, press brick, cut stone exterior;

oak interior finish, maple floors, hard finish plaster; reinforcing and structural steel, d. s. and prism glass, slate blackboards, Metzker steel stairs, Barrett specifications roof, plumbing, steam heating, fan ventilation, deep well pumps, pressure tanks, laboratory fixtures and furniture, cost \$25,000; bids to be called for soon by architect; C. C. Chamberlain, clerk, Grenada.

The Minnesota Fama Stonewood Co. have been awarded contracts by the board of education, Minneapolis, Minn., for installing Fama Stonewood treads in stairs of Prescott, Schiller, Seward and West high schools; work to be completed during Christmas holidays.

Fama Stonewood floors are now being installed in the North high school, Minneapolis; Evangelical Lutheran hospital, Marshalltown, Iowa; high school, Fosston, Minn., high school, Madelia, Minn.; and in the new hospital at Harvey, N. D.

Kirby T. Snyder, architect, Plymouth building, has prepared plans for a church building at Aitkin, Minn.; 1-story, basement, brick, bids will be received by the architect up to Feb. 1, 1914; building will be modern, dining room, kitchen, toilet rooms, furnace heat, rolling partitions, art glass, pews, interior decorations, press brick exterior; cut stone trim, oak interior finish; maple floors, electric wiring, electric fixtures; apply to architect for plans; A. L. Richardson, pastor, Aitkin; cost \$10,000.

Kirby T. Snyder, architect, 749-50 Plymouth building, has plans in progress for a brick church building, 40x75, for the Swedish Evangelical Lutheran Zion congregation, Milaca, Minn.; concrete foundation, press brick and cut stone exterior, oak interior finish, wood and cement floors, structural steel, ornamental plaster, pews, art glass, decorations, etc.; plans ready about Jan. 1 1914; cedar shingle roof; cost \$10,000.

Kirby T. Snyder, architect, Plymouth building, has plans completed for the 4-family flat building for Margaret McGrath, at 1315 3d av. S.; concrete foundation, press brick and cut stone exterior, brick interior finish and floors; hard plaster, plumbing, steam heat, electric wiring, gas and electric fixtures, pitch and gravel roof; C. G. Victorson, contractor for superstructure; cost \$4,000.

Keith's Architectural Service, McKnight building, has furnished plans for residences: Edward Eichenberg, Peru, Ill., \$3,200, frame, hot air heat; J. M. Roe, Orchard, Iowa, \$2,700, frame, hot air heat; John A. Stewart, Springfield Minn., frame, hot water heat, \$3,500; Dr. L. L. Webb, Beatrice, Neb., frame, hot air heat, \$2,800.

A plant will be built in the spring by the Sanitary Vacuum Street Cleaner Co. of America in northeast Minneapolis. It will be an assembling plant; American Blower Co., Detroit, will furnish parts; plant secured by Civic and Commerce association of Minneapolis; E. E. Eder, general council for firm.

Kirby T. Snyder, architect, Plymouth building, has plans in progress for a 2-story residence for H. B. Thornton, Benson, Minn.; frame, shingle roof, quarter-sawn oak finish, hard plaster, d. s. and plate glass, art glass, electric wiring and fixtures, plumbing, hot water plant, cost \$5,000; plans ready about Jan. 1, 1914.

*L. B. Byard, 610 Loan and Trust building, is building a 2-story frame dwelling at 2051 S. Aldrich; 34x26, concrete block foundation, hardwood floors and trim, electric light, fireplace, sun room, sleeping porch, bookcases, laundry tray, leaded glass, tile bath, cost \$4,500; Irwin Goldstein, builder.

Honstain Bros., elevator contractors Corn Exchange, have contracts for 10,000-bushel elevators at Rawson, N. D., and Arnegard, N. D.; 10 h. p. gasoline engines, sub-contracts awarded; firm reports 1913 building a little off, but that 1914 will be a good year in elevator construction.

Kirby T. Snyder, architect, Plymouth building, has plans completed for a 1-story double store building, 2d av. S. between 2d and 3d sts.; 40x44; press brick front, plumbing, structural steel, pitch and gravel roof; plate and prism glass; cost \$2,000; Timothy T. Ryan, owner.

Plans have been furnished by Glenn L. Saxton, Plymouth building, for a dwelling at St. Peter, Minn., for R. W. Maltby, frame, birch trim, 20x24; cost \$2,200; also for dwelling at Peoria, Ill., for F. H. Foster, 110 Hamilton blvd.; birch trim, frame, 25x28, \$2,800.

*A plaster veneer and shingle dwelling will be built by Erick Holmlund, 3626 Aldrich av. S., at 4048 Pleasant; 24x32, hardwood throughout, hot water heat, mantle, leaded glass, sideboard and book cases, wiring, cost \$33,000, day labor.

Plans by C. A. Boehme, architect, Kasota block, for Henry

Said N. A. Hawkins, Sales Director of the Ford Motor Co., Detroit, a few months after enrolling in the Alexander Hamilton Institute:

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Position _____

Address _____

A. Fritz, call for a 1-story brick store at 819 20th av. N.; 42x70, brick and concrete foundation, plumbing, wiring, plate glass, \$3,500; E. F. Wandersee, contractor, 1000 NE. Main.

Plans for a club house and hall will be prepared for the Robbinsdale Civic & Improvement club, recently organized, the following committee having been appointed to investigate and report; G. J. Urban, meat market, chairman.

The Grand Avenue Church of Christ will build a new church at Lyndale av. and 31st st. The congregation has voted to buy 105 feet of frontage and will build a year hence. The present church is at Grand av. and 31st.

A duplex is being built by Peter F. Faber at 2639 N. Oliver; 28x36, concrete block foundation, hot water heating plant, plumbing, wiring, laundry trays, hardwood trim, cost \$4,500; Matt J. Thies, builder, 623 20th av. S.

*C. H. Fagerstrom, 3600 16th av. S., is building a 1½-story plaster veneer dwelling at 3616 16th av. S., 22x30, concrete block foundation; hardwood throughout, electric light, hot water heat; cost \$3,500; day labor.

Herbert S. Marshall, 4552 Washburn av. S., is building a bungalow at 2115 S. Drew av.; concrete block foundation, 26x28, hardwood trim, plumbing, gas, \$2,200; Carl Lundquist, 1019 Washington av. S., builder.

The S. Swenson Artesian Well Co., of Minneapolis, Minn., have completed a ten-inch well about 500 feet deep at Mountain Lake, Minnesota, for their city water supply, an excellent well, giving entire satisfaction.

A factory is planned by Diamond Manufacturing Co., incorporated at \$100,000; A. C. Bussey, 4908 Lyndale av. S., president, E. J. Peck, secretary; estimated cost of factory, \$20,000.

*Geo. N. Suffern, 2512 15th av. S., will build a plaster veneer bungalow at 3824 11th av. S.; 25x40, concrete block foundation, hardwood trim, plumbing, gas, \$2,500, contract not let.

*John E. Magnuson, 611 25th av. S., is building a 1½-story frame dwelling at 2600 S. 7th; 24x31, concrete block foundation, plumbing, gas, hardwood trim, cost \$2,500; day labor.

Minnesota Manufacturing association is making an interesting display of its gravity conveyors in the windows of Smith Candy Store, Nicollet between 6th and 7th sts.

*Contract was awarded to the J. & W. A. Elliott Co., Lumber Exchange, for the excavation and foundation of the Saxe theater, 7th st.; Chapman & Magney, architects.

The Lyngblomsten societies of Minneapolis are planning to build an addition to the Lyngblomsten home for aged men and women, 1298 Haskell av. N. next spring.

*Blanch H. Jones is building a plaster veneer dwelling; 23x26, hardwood trim, plumbing, gas, concrete block foundation, at 4421 S. Washburn.

J. Chester is building a duplex at 626 Girard N.; 26x46, frame, hardwood trim, plumbing, gas, \$3,500, stone foundation; day labor.

Fire destroyed 3-story brick structure at St. Louis Park, owned by T. B. Walker, Red River Lumber Co., Minneapolis; loss \$9,000.

Carl Newstrom 4505 1st av. S., is building a modern dwelling at 3921 5th av. S.; 24x26, hot water heat, cost \$3,000; day labor.

Fire destroyed the dwelling of Frank Martell, 40th av. and 3d st. NE.; loss \$2,000; no insurance.

Warehouse of the Minneapolis Brewing Co., at Rochester, Minn., was destroyed by fire.

SIoux CITY, IOWA

Sioux City Office: 310 Iowa Building; R. V. Sager, Representative.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

S. Holtz, frame dwl., Rose Hill add., 3,000
Chas. Duff, frame dwl., Holman's add., 2,500
J. G. Sandwahl, frame dwl., Wright's add., 2,500
City's offer for land owned by C. J. McNamara to be used for a boulevard was accepted.

Wm. L. Steele, architect, United Bank building, has drawn plans and specifications for a residence for J. Harry Scharf to be located on Pearl st. It will be strictly modern, have hot water heat and will cost about \$7,000. The owner will take bids.

Hammond Bros. contractors, were awarded the general contract for two houses for J. S. Casey for \$5,400. Buntler & Arnold, architects, Security building.

Buntler & Arnold, architects, Security building, have completed the plans for the Morningside Country club. Bids will be opened on Jan. 15.

Bids will be opened Dec. 30, on the residence for F. M. Pelletier; Buntler & Arnold, architects, Security building.

The wiring for the residence for W. A. Barrett was let to W. H. Harper.



ST. PAUL, MINN.



404 Scandinavian American Bank Bldg. Phone: N.W. Cedar 1683.
Mail or telephone news not later than Wednesday.

BUILDING PERMITS.

Frank Aubin, builder, 1742 Dayton av., 1½-story frame dwl., Dayton near Herschel.....	3,000
E. F. Berrisford, builder, 388 Robert st., 1½-story frame dwl., Victoria near Hatch.....	1,500
Geo. Benz & Sons, E. 3d, repairs, 197 E. 3d; J. M. Carlson, builder.....	5,000
H. R. Smith, University Farm, 2-story frame dwl., Chelmsford near Buford, Donaldson Bros., builders.....	4,500
F. A. Olson, 1603 Laurel av., 2-story frame duplex, Ashland near Aldwin, F. A. Olson, builder.....	2,500
Mrs. T. H. Dahl, Minneapolis, 2-story frame dwl., Branston near Hendon, Martin Wilson, builder.....	3,200
H. M. Elmer, 1329 Hague, 1½-story frame dwl., Portland near Snelling, H. M. Elmer, builder.....	4,400
A. Magnuson, 1061 Fairmount, 2-story frame dwl., Fairmount near Oxford, L. Magnuson, builder.....	2,500
J. Magnuson, 1061 Fairmount, 1½-story frame dwl., Lexington near Fairmount, Lindquist & Magnuson, builders.....	2,500
N. G. Person, 1230 Dayton, 1-story frame dwl., Marshall near Syndicate; N. G. Person, builder.....	2,030
Thos. Frankson, 400 Lincoln bldg., Minneapolis, repairs to apartment house, Ramsey terrace; Andrew Rankin, builder.....	2,000
E. Rydeen and Emil Asplund, 2-story frame flats, Aurora near Avon; Edwin Rydeen, builder.....	7,000
C. F. Robinson, 1566 St. Anthony, 1½-story frame dwl., Breda near Avon; C. E. Bruce, builder.....	2,800
Wm. C. Henning, 701 Ohio st., 1½-story frame dwl., Winona near Ohio; John Hammer, builder.....	2,300
C. J. Buell, builder, 1540 Laurel, 2-story frame dwl., Laurel near Saratoga.....	5,000
C. D. Taintor, builder, 2338 W. Como, 2-story frame dwl., Como av. W. near Doswell.....	4,000

St. Paul will start the new year with a notable list of new structures including the public library and Hill library, the new Merchants' National Bank building, the large addition to the Finch, Van Slyke & McConville, wholesale house, the big plant of the Illinois Steel Co., new commercial building at 4th and Minnesota, the Minnesota club, new flat building, College and Wabasha, to contain over 100 apartments, for H. E. Habighorst, a new commission row, 11th and Jackson, of which one row is being built and two more are to be built; the \$500,000 Historical library and Supreme Court building; Hill building on Jackson between 5th and 6th, one of the largest down town structures which the city will have, equaling the Gordon-Ferguson building just behind it, which covers half a block and is now under roof; the new Union station, variously estimated at \$9,000,000 to \$15,000,000; a long list of alterations and new construction, costing millions, made necessary by the widening of Robert st. from 3d to 8th sts., which must be completed by next April, cutting off 20 feet of all buildings on one side; a row of stores and apartments completing the new business center on Wabasha between College av. and Summit; new Christian Science church, Summit! also House of Hope; further items could be mentioned to show that the city has never started a new year with better prospects of actual and planned construction than will attend the opening of 1914.

One of the finest buildings to be included in the rapid improvement of the Capital city will be the art museum. The St. Paul Institute is getting preliminary sketches from an architect, Thomas G. Holyoke, and is making a very careful and thorough study of museums in this country and abroad. The greatest care is being taken in proceeding to build and all of the information secured will be thoroughly digested before decisions are reached. It is realized that this \$2,000,000 structure must be monumental; that it will be built for all time; that it will have a mission to fulfill in its architecture as well as in its contents as the home of an art collection. The work of preparing to build was advanced a step this week by the completion of the preliminary sketches by the architect, Mr. Holyoke, who, it is a pleasure to state, is a St. Paul man. He has designed a beautiful building of a classic, monumental character, in perfect taste, of great dignity. Its admirable qualities grow on the beholder. It will be quite eligible to the fine society it will find itself in, from being near the Cass Gilbert masterpiece, the capitol; and the \$500,000 historical library and supreme court building about to be built. These three will form a noble group of buildings which no city in the country will outrival.

Plans for the construction of the new Carnegie library at White Bear are in the hands of the Carnegie commission, and the building of the structure will be commenced just as soon as they are approved and returned. The tentative plans already have been approved. White Bear's new public library, to cost approximately \$5,500 will be on a \$1,000 site at Clark av. and 2d st. J. E. Extrand, president of the library board; county school superintendent G. H. Reif, vice president, and R. R. Knowlton, secretary.

Appraisers were named by the board of public works in boulevard propositions now under consideration and

these conferred with the board recently relative to the contemplated condemnation proceedings involved in acquiring the necessary property. H. H. Miller and F. E. Meacham are the appraisers for Johnson and Mounds boulevards, and Charles Thompson and A. Cathcart will appraise the Cherokee Heights and Prospect boulevard property. The appraisers will set to work at once.

H. A. Sullwold, architect, Commerce building, has furnished plans for a bungalow on Princeton in Macalester Park for A. W. Seng, 1732 Summit; 32x30, store foundation, hot water heat, brick fire place, electric light, hardwood throughout, laundry trays, frame and stucco, \$3,000; C. E. Swanson, general contractor, Lincoln st.; E. J. Snyder, plumbing, Grand av.; Schnieder & Luckert, heating.

H. A. Sullwold, architect, Commerce building has prepared plans which will be out by first of year for a frame and stucco dwelling, English style, on Portland and Pierce for Elizabeth Milton; hot water heat, sleeping porch and sun-room, brick fireplace, tile bath, electric light, pantry fixtures, laundry; architect will take figures.

Mrs. F. H. Dahl, Park av., Minneapolis, is building two dwellings; 2-story frame, 26x28, on Branston near Hendon, modern, tile bath, hot water heat, \$3,200; M. Nelson, 2815 E. 22d, Minneapolis, builder; also 2-story frame, 24x29, modern hot water heat \$2,700, same location.

A. C. Maxfield, 781 Linwood place, was announced in a newspaper report this week, as the owner of the new building, 4th and Minnesota, heretofore supposed to be planned for John R. Mitchell as owner; 3-story brick, \$45,000; walls for three additional stories.

A flat building is being erected by E. R. Rydeen, 815 University av. and Emil Asplund, on Aurora between Avon and Fisk, 33x54, 2-story frame, concrete foundation, hot water heat, laundry, hardwood trim, electric light and bells; cost \$7,000; E. Rydeen, builder.

C. F. Robinson, 1566 St. Anthony is building a 1½-story frame dwelling, 24x36, concrete foundation, hardwood trim, plumbing, wiring, hot water heat, on Breda between Arona and Snelling; E. C. Bruce, builder, 1330 Adams, NE., Minneapolis.

Permit was issued for two modern residences; C. J. Buell, 1540 Laurel, 2-story frame, 32x34, all modern, \$5,000, owner building; C. D. Taintor, 2338 W. Como, 2-story frame, 28x26, all modern, \$4,000; Como between Doswell and Pierce.

Earle D. Jackson, consulting engineer, Capital Bank building, is making a survey of the chain of lakes north of Hibbing, Minn., with a view of establishing a water supply and a force of surveyors at work; they will continue for some time.

Hartford & Jacobson, architects, Capital Bank building, will issue plans for the Mortmarty hospital, Yankton, S. D., Jan. 15 and bids will be in Feb. 15, 1914; this is an extension of time; bids will be received at office of architect.

Bids will be received till 2 p. m., Dec. 29, for a brooder house at the University Farm; plans at the office of G. A. Sandberg or A. M. Bull, University Farm; officially advertised in the Improvement Bulletin this week.

There will be concrete spans in the Morgan-Foster garage, 40 feet long, making them among the longest in the city; width 16-inch reinforced, to carry floor slab; Alden & Harris, architects, Commerce building.

Wm. C. Henning, 761 Ohio st. is building a 2-story frame dwelling, 24x26, hardwood trim, plumbing, wiring, cost \$2,300; Winona between Ohio and Manomin; John Hamer, builder, 521 Minnehaha av.

Frank Aubin 1742 Dayton, is building a 1½-story frame dwelling, 24x30, on Dayton, between Herschel and Wheeler, hardwood floors and trim, hot water heat, plumbing, wiring; cost \$3,000.

A. Magnuson, 106 Fairmount, is building two dwellings; 2-story frame, 25x28, \$2,500 each, hardwood trim, plumbing, gas, Fairmount between Oxford and Lexington; Lundquist and Magnuson, builders.

Earle D. Jackson, consulting engineer, Capital Bank building, has prepared plans and specifications for an electric light plant at Lismore, Minn.; to be ready some time in January.

A frame bungalow is being built by W. G. Person, 1231 Dayton, on Marshall between Syndicate and Hammond, 25x30, hardwood trim, plumbing, gas, \$2,000; day labor.

Andrew Rankin, 484 Selby av., has contract for alterations in the apartment house at Ramsey and Pleasant, for Thomas Frankson, 400 Lincoln building, Minneapolis.

Raymer Hardware Co., 373 Robert, will remodel the Peterson block, 56-62 E. 5th st., and remove, as a result of demands of increasing business; cost about \$15,000.

F. A. Olson, 1603 Laurel is building a duplex on Ashland between Pierce and Aldine; frame, 24x40, hardwood trim, plumbing, gas, \$2,500.

P. N. Peterson, Peterson Granite Co., announces that the company will erect a large new plant in 1914, probably in Midway district.

Adolph Meyer, consulting engineer, Germania Life building,

is completing his report on plans for a power plant at the high dam.

J. M. Carlson, 2229 W. 5th, has contract for the repairs and alterations at 197 E. 3d for Geo. Benz & Sons; cost \$5,000.

Fire slightly damaged the Midway general hospital, 389 Snelling N., Dr. P. H. Bennion, house physician.

MILWAUKEE, WIS.

Office: Hathaway Building. Telephone: Main 1827.
Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

Michael Huebner, 701 10th st., flat.....	2,500
Wm. H. Shenners, S. Pierce, between 3d and 24th av., flat	3,500
Shaddolt & Boyd Iron Co., southeast corner Wright and Bolton, storage shed	10,000
G. W. Smith, frame dwl., 64th av. W., between Main and Polk st.	2,000
Felix Skupski, Lincoln av. between 10th and Winlake av., store	5,800
Thas. Tribel, Greenfield between 29th and 30th, flat.....	4,000
Lorenz Miller, 1046 26th av., flat.....	3,300
Henry Ranthum, 1178 29th, flat.....	4,000
Ignatz Marx, N. av. east of 38th st., store.....	2,300
T. P. Kennedy, 1643 26th st., dwl.....	2,700
L. Davis, 795 Hackett av., garage.....	1,000
Forbes Bissett, Wentworth near Texas, dwl.....	3,000
Wm. H. Shenners, S. Pierce near 23d, flat.....	3,000
F. J. Hardern, 790 25th av., cottage.....	2,000
Charles Michel, 1047 23d av., dwl.....	1,500
Henry W. Voelz, Layton boul. near Maple st., flat.....	4,500
Richter, Dick & Reuteman, 695 48th st., flat.....	4,500
Albert Oestereich, Booth st. near George st., flat.....	3,000

Contracts have been awarded by the board of school directors on the erection of the Grant street school, on Grant st., between 24th and 25th avs. Carpenter, Wierdsma & Laatsch, \$13,975; mason, J. Wabiszewski, \$18,500; lathing and plastering Chas. E. Barts, \$3,318; tile, H. Niedner & Co., \$625; sheet metal Millen Bros., \$1,190. steel and iron, C. Hennecke, \$2,450; plumbing, James J. O'Donnel, \$4,367; heating and ventilating, Industrial Heating Co., \$8,784; electrical, Herman Andrae, \$1385; painting Huen Bros., \$1,347; excavating, F. C. Haasa, \$5,890; cut stone, John Hanert, \$3,880; marble and slate blackboards, Breidstier Marble Co., \$2,467 and \$899; hardware, Philip Gross Hardware Co., \$910; heat regulation, Johnson Service Co., \$945. To be 174x85 feet, 2-story, brick walls, costing \$100,000. Van Ryn & De Gelleke, Caswell block, architects. The plumbing in the school barracks on 13th av., near Lincoln av., and in the Milwaukee School of Trades for Boys, Virginia st., was let to Frank J. Smith, at \$620 and \$4,150 respectively. The concrete work in the trade school was let to F. F. Hassa at \$740.

Christiansen & Kemnitz, architects, 87 Howell av., have awarded contracts for erecting a brick veneer and stucco duplex flat for Herman Prange. Carpenter, F. Schultz & Sons; mason, Jos. Tucholka; cut stone, Wm. Bubholz; cement, F. Texter Construction Co.; plaster, Pozanski Bros.; tinning, Krock & Van Ellis; plumbing, Borkenhagen & Pikulek; heating, R. P. Neugebauer; electrical, Co-operative Electric Co.; painting, S. E. Gubbins; art glass, Gavin Mirror & Art Glass Works.

Architects Leenhouts & Guthrie, 424 Jefferson st., are taking bids on a brick veneer residence and garage to be erected on Summit av., south of Lake drive. Bids for excavation, carpenter, mason, concrete, plaster, tile, sheet metal, plumbing, vapor heating, electrical, painting and glass. The same architects will also take bids at the same time for erecting a duplex flat on Chestnut st., between 32d and 33rd sts., for H. J. Roemer; bids on all work except excavating.

Bids will be received until Jan. 15, 1914, at the office of Louis G. Widule, county clerk, for material and labor to install the heating and ventilating and the electric light and power systems for the Milwaukee County Tuberculosis Sanatorium at Wauwatosa. Check for 5 per cent. General contract recently awarded to American Construction Co. at \$500,000. Total cost, \$600,000. Robert Messmer & Bro., architects.

Architects Brust, Philip & Heimerl, 82 Wisconsin st., have awarded contracts on the Philip Saxe department store at 6th av. and Mitchell st., detail previously noted. General work, carpenter, mason and concrete, to J. W. Utley; plaster, F. W. Bauman; sheet metal, Consolidated Sheet Metal Co., iron work, Colnik; painting, Chas. Holland & Son. Cost, \$250,000.

Architect Charles H. Tharinger, State st., will be ready for bids after Dec. 29, for a 3-story, brick and concrete, store and apartment building, 90x108, to be erected at 27th and Center sts., for the Atlas Investment Co. Bids for mason, cut stone, plaster, tile, electrical, composition roofing and plumbing; excavation let to Peter Froeming; carpenter, owners.

Architect Fred Maettig, 3208 North av., has awarded the contracts on a two-store, frame, faced brick and concrete

block, 30x40, building on North av., between 37th and 38th sts. Excavating, A. Haas; general contract, Joseph Milbauer; mason, State Concrete Block Co.; hot air heating, Milwaukee Furnace Co.; face brick, Milwaukee Brick Supply Co.

William and Frank Krause will erect two cottages, 2-story, frame and brick, 24x40 feet, costing \$2,400, for themselves, at 1380 and 1382 29th st. Carpenter and electrical work, owners; mason, Louis Wilke; cement, Wolfe, Graham & Schneider; tinning, Wm. Pergande; plumbing, Wm. Hoepfner; heating, J. Dracamp Co.; painting and glass, John Frank.

Architects Charlton & Kuenzil, Camp building, have awarded all contracts of the West Allis Carnegie library; carpenter, Herman G. Wegner; mason, Lex Bros.; plaster, F. W. Baumann; plumbing, O. P. Zimmermann; heating and ventilating, Mueller Heating Co.; electrical, Co-operative Electric Co.; hardware, Kiefer & Haessler; cork carpet, Boston, store.

Architect Robert Schmitz, Berlin Arcade building, is working on plans for a summer home to be erected at Silver Lake, to be 24x40 feet. Owner's name withheld. The same architect will take bids about the same time for a duplex flat, 24x46 feet, for Carl Hahn. The owner will do the carpenter and Gustave Krueger the plumbing.

Architects Leenhouts & Guthrie, 424 Jefferson st., have awarded additional contracts for erecting a duplex flat for Edward Sprange. Plaster, F. W. Baumann; tinning, Klubertanz Bros. The same architects have awarded the sheet metal work in connection with a residence and garage for Henry Sullivan to Wm. F. Arndt.

J. Ragner, 2514 Fond du Lac av., will erect a duplex flat, 26x52, on 4th st., near Concordia av., to cost \$4,000. Contracts awarded as follows: carpenter, owner; excavating, Aug. Luetke; mason, Herman Peteowsky; plumbing, H. Austin; hot air heating, Jack Goeschel; electrical, A. Isenring.

Architect Chas. H. Tharinger, 2324 State st., has awarded the following contract on an apartment, bowling alley and saloon, for Phil. Valley; Carpenter, L. C. Sorenson; mason, concrete and plaster, H. A. Bower; plumbing, Smollen & Schoenleben; other work, open

The Milwaukee Athletic Club, Wells building, has appointed a committee, with Julius Simon as chairman, and John E. Eldred, secretary, which will work with seven others and the directors on the building plans for a new home. Cost, \$500,000.

Architect Charles Keller, Germania building, is taking bids for the construction of a solid brick, mill construction warehouse, 50x60, for the Milwaukee Printers' Roller Co., at Greenbush st., between Florida and Virginia sts.; cost \$10,000.

Architect Fred Graff, Matthews building, has awarded the tile to Wisconsin Mantle & Tile Co., and heating to L. Riemer, in addition to those previously mentioned in connection with a residence for H. J. Wiehe.

George Adams, Caswell block, has let the following contracts on a duplex flat which he is having erected on Farwell av.: Carpenter, Wm. F. Johnston; mason, Smeaton Construction Co.; plumbing, Michael Mueller.

Architect Frank Howend, 935 2d st., will be ready for bids about the first of the year for erecting a residence for Fred Eitel at 42d st. and Meinecke av. The various building trades will be represented.

The Wisconsin State Board of Agriculture has granted a permit to Landsdale county to erect a permanent exhibit building in the state fair grounds. To be about 50x50 and of concrete construction.

Architect Robert Schmitz, Berlin Arcade, has awarded the vacuum cleaning in a flat for Alfred Mueller to the Campbell Vacuum Cleaning Co. Other work previously mentioned.

Architects Robert Messmer & Bro., Majestic building, have awarded additional contracts on the V. Montvid & Son addition on E. Water st., the plaster to Chas. Bartz.

The new Christ Polish Baptist congregation will erect a church in spring on 14th av. near Forest Home av. The Rev. K. W. Strzeles is pastor. Cost, \$17,000.

Charles Friebe, 1251 Greenfield av., is erecting a frame duplex flat, 24x40 feet, on Greenfield av. near 30th av., to cost \$4,000. General contract to R. P. Hansen Co.

Architects Kirchoff & Rose, Majestic building, opened bids this week on constructing a bungalow for Mrs. Rhehn and a garage for James Hilgel.

Stephen A. Wanza, 32 Center st., is contemplating erecting a store, two offices and apartment building at Bremen and Locust sts in spring.

Michael Huebner, 703 10th st., has commenced excavating for a frame duplex flat, 24x50 feet, adjoining his property. Cost, \$2,500.

Herman Langschwager, 1443 1st st., has commenced building a duplex flat at 1447 1st st., to be 26x46 feet and cost \$3,500.

Henry Ranthum, 1210 28th st., is erecting two frame duplex flats, 24x45 feet, on 29th st. near Hadley st., each to cost \$4,200.

HEAD OF THE LAKES

Office: 206 Manhattan Building. Telephone: Auto 3036.
Mail or telephone news not later than Wednesday.

DULUTH.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

E. Olson, frame dwl., 28th av. W. near 5th st.....	2,000
B. N. Wheeler, frame dwl., 34th av. W. near 2d st.....	1,000
St. Paul's Lutheran Church, 55th av. W. near Central place	6,000

*An improvement in the steel trade in the east is reported and Duluth, the Pittsburgh of the west, is correspondingly elated. The puddle mill at the Youngstown Sheet & Tube Works, Pittsburgh, went on double turn this week, whereas a week ago twenty-four furnaces were operating on single turn. The Riverside mill of the National Tube Co. at Wheeling, Va., will resume operations in full immediately after the holidays. This plant has been working only one day a week for some time. Five of the ten new mills in the new plant of the Wheeling Sheet & Tin Plate Co. at Martin's Ferry, have been placed in operation. The Bessemer & Lake Erie railroad has just begun work on improvements on its shops at Greenville, Pa., to cost \$300,000. Thirty more kilns have been added to production at Newell, W. Va.

*A local newspaper refers to the growing ease of money for mortgage investments as promising to be a factor in the promotion of building operations during the next few months. Operators are taking advantage of this situation to arrange for funds to cover their projected building campaigns. Many loan applications are reported by local agents of eastern mortgage companies to have been placed during the last couple of weeks.

*A committee composed of the following has been appointed to look into the feasibility of having a city hospital established: Mrs. F. L. Barrows, Mrs. Agnes L. Atwood, Mrs. E. L. Tuohy, Mrs. R. A. Webster and Mrs. A. E. Walker. The committee will study the methods used in other cities toward providing free care for the sick and will report at the January meeting of the Womans' Council; Mrs. W. S. Woodbridge, president.

*The old building at 27 W. Superior st. will be replaced by a modern brick structure, two stories in height. The property is owned by Morgan L. Davies of Chicago and his cousin, Joseph E. Davies. "The new building will be built to suit the wishes of the tenants," said Mr. Davies, "and I came to Duluth to find what these wishes are."

*A building which will cover 125 feet of frontage on the lower side of Grand av. between 56th and 57 avs. W., to be used by two of the large uptown retailers for branch stores, is said to be planned.

*Plans for the plumbing, heating, and electric lighting and wiring for the theater to be built by W. Abrahamson on Superior st., are in preparation and will be ready in a few days to ask for bids.

*Property owners have just recovered damages from the city for a change of the grade in a street which put their lots below grade, the decision being in the district court.

*A \$6,000 permit was issued this week to cover the erection of a new edifice on 55th av. W. between Central av. and Elinor st., for the St. Paul Lutheran church.

*It is expected that plans will be ready to figure on in February for the Munger school at 12th av. E. and 18th st.; plans by Holstead & Sullivan, architects.

*The Lounsberry-McLeod Co. is still employing a force of over 200 men on its contract for the houses in the Minnesota Steel Co.'s model town at Spirit Lake.

*Figures being taken by Arthur Hanford, architect, on the interior finish for W. J. McCabe's house at Abbottsford and Lewis sts.

SUPERIOR.

The C. Reiss Coal Co. which owns and operates coal docks in several cities in the state, is planning on making extensive improvements to its dock property at Superior during the winter months. A contract involving an expenditure of \$125,000 has been let to the Heyt-Patterson Co. of Pittsburgh for improvement of the dock property known as the St. Louis Bay dock No. 1. The contractors will conduct a large unloading bridge and a transformer house. The work will be commenced in April and is expected to be completed before the first of June.

Contract has been let to the Lakeside Bridge & Iron Co., Milwaukee, for the construction of a 25,000-gallon steel overhead tank for use in supplying water to the new county work house, at \$2,311, which was more than \$700 under the next lowest bid and \$1,300 less than the official estimate. The Des Moines Bridge & Iron Co. made an estimate at \$2,894, Chicago Bridge & Iron Co., \$3,250 and the Minneapolis Machinery

PROPOSAL ADVERTISING FOR BIDS

PROFESSIONAL DIRECTORY

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any kind of Building Material,
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furnish you, free of charge, the
address of leading firms who can
supply you.

THE
Improvement Bulletin

OFFICIAL ADVERTISEMENTS for proposals will be published in this department on receipt of copy with order from authorized official, building committee, architect or engineer.

RATE FOR NOTICES in this department—15c per line each insertion. No discounts allowed. Several insertions are customary to insure full and fair competition.

PRINTED SLIPS are furnished to officials, architects and others interested, for distribution by them, without extra charge.

PROFITABLE INVESTMENT.—It has been the experience of those who have used this medium that by investing a few dollars they have saved hundreds.

COPY RECEIVED up to Friday, 10 a. m., will be published in the paper, delivered to subscribers on Saturday, but should reach the publication office, Lumber Exchange, Minneapolis, earlier in the week, when possible.

LATE NOTICES Friday morning can be transmitted by long distance telephone.

BITUMINOUS PAVEMENTS

Sioux Falls, So. Dak.

Sealed bids will be received by the Board of Commissioners of the City of Sioux Falls, S. D., at the office of the City Auditor, up to 9 o'clock a. m., of Monday, the 26th day of January, 1914, for the construction of pavement on Prairie Avenue from the north line of Third Street to the south line of Twelfth Street.

Bids will be received on each of the following kinds of pavements; Bitulithic, Tarvia Macadam, Asphaltic Concrete and Dolarway, to be constructed in accordance with the plans and specifications on file in the office of S. B. Howe, City Engineer of said City.

Each bid must be accompanied by a duly certified check for the sum of \$1,500.00 drawn on some known solvent bank of the City of Sioux Falls and made payable unconditionally to the City Treasurer of the City of Sioux Falls, S. D., as a guarantee that the bidder will, his bid being accepted, enter into a contract with and furnish the required bond, to said City.

The work will consist of approximately the following quantities; 15,000 sq. yards of pavement outside of street car tracks; 3,000 sq. yards of pavement along street car tracks.

Specifications and blank form of proposal may be obtained from S. B. Howe, City Engineer.

Each bid must be endorsed on the outside with a statement showing the work covered by the bid and must be filed with the City Auditor before the hour above mentioned.

The right is reserved to reject any or all bids.

Sioux Falls, S. D., this 16th day of December, 1913.

WALTER C. LEYSE,
City Auditor.

(Continued on Page 24.)

PROFESSIONAL DIRECTORY

ENGINEERS

OSCAR CLAUSSEN ENGINEERING COMPANY

Consulting Engineers.
Engineering Experts to Municipalities.
312-16 Commercial Bldg., St. Paul, Minn.

CHARLES L. PILLSBURY,

CONSULTING ENGINEER,
Guaranty Building, Minneapolis.

POWER ENGINEERING CO.

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NORTHWESTERN MANAGERS

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Co., \$2,894. The work on the structure will be commenced at once and the tank will be ready for use when the work-house is completed in the spring.

Prospects seem hopeful for a big hotel on one of the prominent Tower av. corners in the heart of the business district within a comparatively short time. A western capitalist is figuring with a local realty concern and will be here within a couple of weeks to close the deal. Negotiations have been in progress for some time and the parties to the deal now are not far apart.

WINNIPEG, MAN.

The following permits have been issued: L. Petrakov, dwelling, College av., cost \$1,500; International Investment Co., foundation for apartment block, Mulvey av., \$2,000; J. Beaton & Sons, two dwellings Ethelbert st., \$11,000; S. Miller, two dwellings, Pine st., \$6,000; W. W. Fleming, dwelling, east side of Goulding, between Portage and Wolover, cost \$4,200.

The Kildonan council, F. Hill Parr, engineer, and H. N. Rutan, consulting engineer, were having a meeting, and were considering the expenditure of \$653,374, for sewerage works and water supply. Mains may be laid for permanent supply.

The council of the town of Tuxedo, a suburb of Winnipeg, will execute the following improvements; trunk sewer; two sub-mains; lateral sewers; water mains; cement pavements; sewers, etc.

It was reported that the paving contract in Assinaboia was not awarded as was stated to the Bitulithic Co. The contract has not been signed yet, and there is a motion to rescind the contract.

The cost of the construction of the Fort Garry Hotel is \$1,498,300, the original permit was for \$1,300,000, but an additional permit has been issued for \$198,300.

Tenders are wanted to Jan. 29, by chairman, board of control, Winnipeg, for electrically operated switching apparatus and accessories for King street sub-station.

\$500,000 will be spent for the erection of the new Leland hotel which is to be built up in the spring.

Tenders are wanted by the City Light & Power department 54 King st., Winnipeg, for the assembling and erection of ornamental street lighting standards.

Tenders are wanted to Jan. 9, by chairman, board of control, Winnipeg, for supply of quantity of cast iron water pipe and specials for domestic water system.

Tenders are wanted to Jan. 5, by chairman, board of control, Winnipeg, for pole type and subway transformers, required for 1914.

Tenders are wanted to Jan. 2, by chairman, board of control, city, for the supply of valves for domestic water system.

The total amount for the building permits issued, up to date is \$18,518,750.

Tenders have been called by chairman, board of control, Winnipeg, for sewer construction to cost \$100,000.

DES MOINES, IOWA

Bert N. Mills, Representative, 310 Hubbell Building.

BUILDING PERMITS.

Za-Ga-Zig Temple of the Mystic Shrine will not build its new \$100,000 temple here immediately. Earl C. Mills, retiring potentate, and the board of trustees, both favored the project at the annual meeting last week but it was decided to defer the work and rearrange the present structure for the present needs of the organization. The interior of the building will be remodeled and the seating capacity increased at once. The temple now in use was formerly the First Methodist church and is located at W. 9th and Pleasant sts. It is proposed to build the new temple within 5 years. George E. Hamilton is new potentate to succeed Earl C. Mills.

Over 300 miles of paved road across Iowa is the purpose of a movement started at Colfax a few days ago by the River-to-River Road association which controls the destinies of the River-to-River Road, Iowa's first organized and most famous highway. It extends across the state from Davenport to Council Bluffs and it is the aim of the association to secure legislation which will enable the counties to pave the highway with brick or concrete across the entire state; address Bert N. Mills, secretary, River-to-River Road, Des Moines, Iowa.

Emil G. Schmidt, president of the Des Moines City Railway, announces that work will begin in March on a new freight house and terminal station to be built at West 2d and Grand. This will serve as a passenger station for the interurban lines owned by the city railway. New offices of the company may also be built in connection with the structure.

Des Moines spent \$1,033,213 for permanent improvements

in 1912 according to the report of the United States Department of Commerce just received here. This sum includes all payments for sewers, paving and all public improvements. The total expenditure of the city for 1912, according to the federal report, was \$2,486,640.

The Charles Weitz Sons' Co. will finish work January 1, on the new Hawkeye Transfer Co. warehouse at W. 4th and Tuttle sts. The building has cost \$130,000. It is 7-story, of concrete construction and absolutely fireproof. F. M. Hubbell is the owner and it is leased to the Hawkeye Co. for a long term of years.

The Master Builders' association of Iowa has a report from C. A. P. Turner of Minneapolis, member of the American Society of Civil Engineers, on the cause of the collapse of the Lyman building at Cedar Rapids, Nov. 14, when 7 men were killed. Mr. Turner is a recognized authority on reinforced concrete.

At a banquet of the East Des Moines Commercial Club, propositions for the coming year were discussed including paving E. 14th to city limits; concrete bridge over the river at Grand av. and paving of E. 6th from E. Court st., Indianola.

Frederick C. Hubbell is president and Grover C. Hubbell, vice president of a company capitalized at \$210,000 which was organized here a few days ago for the purpose of erecting office buildings; incorporation articles have been filed.

The Dubuque Telegraph-Herald has just bought a property with 64 feet of frontage on Main st. The 3-story building on the property will be remodeled for use as a publishing plant and a modern newspaper equipment will be installed.

The Acme Roof & Tile Co. of Des Moines announces that it has the contract for roofing tile to be used on a \$150,000 residence soon to be erected in Seattle. Seven American and 4 foreign competitors were among the bidders.

Ground was broken on the Coe college campus, at Cedar Rapids, last week for the new girls' dormitory to cost \$125,000. Dr. E. R. Burkhalter, president of the board of trustees, was in charge of the ceremonies.

E. W. Brown announces that work will start soon on a new concrete garage to be erected at the corner of W. 4th and Grand, Des Moines; Mr. Brown built the Brown apartments here.

Fontanelle will have a special Christmas Day celebration in honor of the completion of its new electric light system. The current comes by transmission wires from Greenfield.

Supreme Court decision favoring plans for extension and improvement of capitol grounds leaves the matter in the hands of the executive council which will buy the land.

Bids on concrete bridge over Walnut creek, exceeded estimates by \$3,000, and project will be delayed on account of high money.

Three dwellings will be built by Anderson & Gottard, cost \$1,900 each; 3303 and 3307 Oxford av. and 32 and 3218 Cambridge.

OMAHA, NEB.

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

A. J. Abrahamson, 3710 Maple, frame dwl.....	2,200
S. Goldsmith, 27th and Patrick, brick dwl.....	2,500
C. Noss, 5333 N. 23d st., frame dwl.....	1,000
Alice H. Kountze, 423 S. 39th, repairs.....	12,000
J. B. Phippen, 3124-26 Marcy, two frame houses, each.....	2,500
Ernest E. Swanson, 2816 Maple, frame dwl.....	1,500
Laura Allis Maxfield, 3018 Cottage Grove, frame dwl.....	1,500
Ed. Johnstone, 708 S. 38th st., brick stucco dwl.....	4,000
A. D. Wheeler, 1707 N. 36th av., frame dwl.....	1,800
S. P. Carlson, 3508 Claif, frame dwl.....	2,500
H. J. Root and estate of Louise M. Root, 32d and Pacific, repairs.....	2,200

SEATTLE, WASH.

Notes Arranged Alphabetically by States.

Emanuel Evangelical Lutheran Church, 4320 N. 14th; A. L. Rankin.....	10,000
Ed. Arvidson, bungalow, 4815 N. 10th; H. Johnson.....	10,000
E. Hutchinson, bungalow, 4419 N. Gove.....	1,250
Griffin Wheel Co., office building, S. Tax.; W. J. Hillyard.....	6,000
B. C. Smith, barn, 2305 E. D.....	1,500
E. W. Cooper, flat, 5221 Birmingham.....	2,000
F. C. Grosser, cottage, 207 N. 9th; Herman Johnson.....	1,500
Peter Adler, bungalow, 2356 Alaska.....	1,000
Pac Brewing & Manufacturing Co., alterations, S. 2d and Adams.....	5,000
O'Reilly Home Investment Co., 347 E. 55th st., 1-story residence.....	1,600
A. F. Nickels, 5035 19th av. NE., 1½-story residence.....	3,500
Rufus Buck, 349 E. 51st, 1½-story residence.....	2,200
J. B. Goodrich, 3819 5th st. NW., 1½-story residence.....	1,700
H. E. Williams, 1312 N. 43d st., 1½-story residence.....	1,800
John Collins, 300 25th av., 1½-story residence.....	3,000
A. O. Wells, 6711 Dibbke av., 1-story addition to residence.....	1,200
Oscar Elf, 4326 18th av. NW., 1-story residence.....	2,600

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Minneapolis
Minn.

PROPOSAL ADVERTISING FOR BIDS.

SEALED BIDS WANTED

Sealed bids will be received by the City Council of the City of Montevideo, Minn., for furnishing the material and constructing 2,142 feet of sanitary sewer, according to the plans and specifications on file with the City Clerk; up to Monday January 5th, 1914 at 8 o'clock, P. M. A certified check for 10 per cent of the amount must accompany all bids. The Council reserves the right to reject any and all bids.

Dated at Montevideo this 16th day of December, 1913.

A. M. PARKS,
City Clerk.

STRUCTURAL WORK FOR NORTH WING AND THE NORTHEAST AND NORTHWEST CORNER PAVILIONS OF THE WIS- CONSIN STATE CAPITOL.

The Capitol Commission of Wisconsin invites proposals for furnishing the necessary labor and material for the structural work for the North Wing and the Northeast and Northwest corner Pavilions of the Wisconsin State Capitol now building at Madison, Wisconsin.

This work is to be executed in accordance with the plans and specifications prepared by George B. Post & Sons, Architects, and is to be done under their supervision and direction.

Plans and specifications for the work may be examined at the following places, viz:

The office of the Architects, 101 Park Avenue, New York.

The office of the Capitol Commission, new South Wing of the Capitol, Madison, Wisconsin.

The Builders' & Traders' Exchange, Milwaukee, Wisconsin.

The American Contractor, 180 N. Dearborn St., Chicago, Ill

The Improvement Bulletin, Lumber Exchange building, Minneapolis.

Plans may also be obtained for the individual use of prospective bidders by depositing with the undersigned a certified check of \$100.00, which check will be returned to the maker upon the return of the plans.

All proposals must be made on printed blanks and must be accompanied by a certified check (in amount of 5 per cent of the total proposal) which will, in case the proposition of the maker is accepted and he fails within ten days to execute a satisfactory contract and furnish a bond as provided by law, be forfeited.

Proposal blanks may be secured by application to the undersigned, to whom all proposals must be delivered, sealed and properly endorsed, by Tuesday noon, Jan. 27, 1914.

Lewis F. Porter, secretary.
Capitol Commission of Wisconsin.
Madison, Wisconsin.

BOILER, PERHAM, MINN.

Sealed bids will be received by the Village Council of Perham, Minn., for one 72x18 boiler. Bids to be opened by the Council, January 12th at 8 P. M., 1914.

Right is reserved to reject any or all bids or to accept the one conforming to specifications which are on file with the Village Recorder.

PAUL MILLER,
Recorder.

BANK BUILDING.

Long Prairie, Minn.

The undersigned hereby gives notice that sealed proposals for the erection of building and bank fixtures and remodeling of banking room at Long Prairie, Minn., including all labor and material, will be received by The Peo-

ple's National Bank and the Reichert Improvement Co., of Long Prairie, Minn., until the hour of 2:30 P. M., on the 12th day of January, 1914.

All bids must be in strict accordance with the plans and specifications prepared by A. Moorman & Company of St. Paul, Minn., which may be seen at the office of Builders' Exchange, Minneapolis, Minn., on and after December 22, 1913, and may also be seen on application to People's National Bank, Long Prairie, Minn.

Make bids separate on Bank Fixtures, also on Banking Room.

A certified check for \$200, payable to the order of People's National Bank, must accompany each bid as a guaranty, the same to be returned to unsuccessful bidders immediately on letting the contract. The party to whom the contract is awarded will be required to give a satisfactory bond in the sum of \$3,000, for the faithful performance of the contract. The right is reserved to reject any or all bids.

(Signed)
PEOPLE'S NATIONAL BANK,
Long Prairie, Minn.
By JOHN J. REICHERT,
Cashier.

Long Prairie, Minn.,
December 20, 1913.

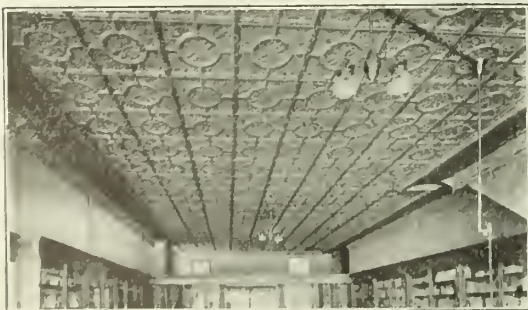
Brooder House.

"Sealed bids will be received until 2 P. M., Monday, December 29th, 1913, for Construction of Brooder House at University Farm. Plans and specifications can be seen at office of G. A. Sandberg, Purchasing Officer, or A. M. Bull, University farm."

Certified check for 2 per cent of amount must accompany bid. Bond of 75 per cent will be required.

H. G. HAYES, Comptroller,
University of Minnesota.

(Continued on page 26.)



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Our figures cost nothing, and
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and Ornament Co.**
ST. PAUL, MINN.

FARGO, NO. DAK.

Mail or telephone news not later than Wednesday.

Plans for the garage to be built by W. M. Ball will be ready for bids early in 1914; 2-story, 63x300, plans by Samuel Crabbe, fireproof.

Northern School Supply Co. will build a frame warehouse, 50x100; bids closed Dec. 23, bids received by owner for all work.

STREET AND ROAD WORK

Notes Arranged Alphabetically by States.

Ariz., Yuma—Bids received by the board of supervisors until Jan. 10, for highway improvements in Yuma county, to comprise oiled macadam roads, surface oiled roads and earth and gravel roads; \$500,000 to be expended; bidders must inform themselves by personal inspection of the grounds as to all conditions affecting the work.

Alta., Medicine Hat—A. M. Grace proposes to build the Esplanade subway, recently ordered, for \$475,000.

B. C., Vancouver—Petition to commissioners asking them to pave about 2.5 miles more of road beginning where pavement now ends.

B. C., Vancouver—Council has decided to pave S. Cambria, Drake, Cordova and Vine sts.; also Victoria drive, Commercial drive and 71st av.; cost estimated at \$311,776; F. L. Fellows.

Colo., Denver—Bids received at the office of the U. S. Reclamation Service, 408 Commonwealth building, Denver, until Jan. 15, for furnishing 250,000 barrels Portland cement, f. o. b. cars at works of bidders.

Ida., Idaho Falls—The state highway commission has employed a crew of surveyors to begin laying out state highway to connect southwestern Idaho with the northern counties of the state.

Iowa, Atlantic—A committee of the council has been appointed to investigate cost of paving alleys about town; address city clerk.

Iowa, Carroll—At least two streets in the residence district of the city will be paved the coming year with some form of concrete and several more blocks in the business section will be paved with brick.

Iowa, Clarinda—Twenty-four blocks are to be paved in 1914; address city clerk.

Iowa, Clear Lake—Hearing by the city council Jan. 23 on curbing both sides of Main st. within certain limits, including all street and alley intersections where good and sufficient curb is not now in place; C. C. Palmeto, city clerk.

Iowa, Des Moines—Among propositions to be undertaken the coming year are the paving of East 14th st. to the city limits, the raising of East Grand av. between the bridge and 4th st., the construction of a concrete bridge over the river at Grand av., and the paving of E. 6th st. from E. Court to the Indianola road; Horace Susong, city clerk.

Iowa, Des Moines—The campaign for the river to river road paving has been begun by the naming of directors in each county to carry the work forward.

Iowa, Ida Grove—City council is planning for a large amount of paving; city clerk for details.

Iowa, Marion—A resolution of necessity is being published providing for the improving of certain streets with either vitrified brick, or concrete, creosoted wood blocks, bitulithic, dalarway or tarvia; P. O. Clark, city clerk.

Iowa, Odebolt—The paving question is again being discussed; address city clerk.

Iowa, Ottumwa—Commissioners have adopted plat and schedule for paving on Church st. from Market st. bridge to Myrtle st.; also for paving S. Market st. from Main st. to C. R. I. & P. tracks.

Iowa, Sioux City—Bids received by Paul J. Wells, city clerk, until 10 a. m., Dec. 27, for sidewalks in Bellevue, Boulevard, Hedges, Table and Uierce additions; check for 5 per cent.

Iowa, Sioux City—Two petitions, asking for the paving of S. Newton st. and Stone av. in Morning Side will be filed with the council at an early date.

Kan., Chanute—Petition is being circulated for a brick pavement 26 feet wide on N. Washington av., from Main north to Beech st., eight blocks; address city clerk.

Kan., Lawrence—The council has voted to pave with brick, portions of Louisiana, Pinckney, Vermont, Kentucky and Hancock sts., and with asphaltic concrete, Rogers and Sherman avs., Henry and Conklin sts.; address the city clerk.

Kan., Lawrence—City council passed resolutions for grading, curbing and paving of Hancock st., paving to consist of one course of vitrified brick blocks on 4-inch concrete base; F. D. Brooks, city clerk.

La., Lafayette—Bidders on 16 miles of public highway were as follows: Worthington Construction Co., Brookhaven, Miss., \$47,815; G. W. Prattman, Danville, Ill., \$50,634; Nicholas & Jones, Lake Providence, La. \$52,484; Boyd & Bradshaw, Columbia, Miss., \$58,364; Texas Grading Co., Houston, Texas, \$58,555; Ritchie & Co. Camden, Ark., \$64,283; Thos. Larkin, Sherman, Texas, \$68,645. Bid of Worthington & Co. recommended for acceptance to the police judge of Lafayette parish; C. C. Sandiz, secretary.

Minn., Carlton—Hearing at the county auditor's office Jan. 15, on the construction of a state rural highway known as No. 11; August R. Norman, county auditor.

Minn., Carlton—Bids to be asked on about 30 miles of road work in Carlton county about Jan. 1; O. L. Dent, Carlton, for information.

Minn., Crookston—County is having 3 miles of highway along the state road north of the fair grounds improved with gravel.

Minn., Granite Falls—F. Roe, state engineer, recently surveyed the state road between Gatchell's place and the Great Northern depot where the state, county and city contemplates expending about \$4,000 next summer for good roads; S. O. Tjosvold, county auditor.

Minn., St. Paul—The county board will soon advertise for asphalt for its road work next summer; address county auditor.

Minn., St. Paul—City Engineer Oscar Claussen estimated cost for improving Prior av., from Marshall to University, including water and sewer connections, at \$42,600, and the assembly has passed final order for the paving, and board of aldermen is expected to take similar action; creosoted blocks will be used.

Minn., St. Paul—Plans outlined for next year's paving program include the following streets at the estimated costs named: Summit, south side of street, from Snelling to Lexington, creosoted wood block, and Summit, Snelling to the River boulevard, creosoted block, \$219,500; Portland, Western to Dale, resurfaced with asphalt, \$14,352; Holly, Western to Dale, resurfaced with asphalt, \$13,826; Snelling, University to Grand, creosoted block, \$58,000; Case, Payne to Westminster, asphaltic concrete and brick, \$21,500; Westminster, Case to York, and York, Westminster to Mississippi, brick, \$10,000; Market, 3d to 6th, resurfaced with asphalt, \$6,200; Hamline, Summit to Grand, creosoted block, \$4,600, making a total of \$347,978. This pavement is already ordered and is certain to be laid next season. The balance of the paving program for next year is expected to include Selby, Marshall, Prior, University, Dale, if cross-town line is ordered built next spring; Hastings, Minnehaha, and possibly other arterial and cross-town streets. It is hoped to have all these proposed improvements in shape to finance them prior to June 1, when the new charter goes into effect.

Minn., Winona—Petition has been presented to pave Broadway between Main and Harriet with brick; George Hoffman, city clerk.

Mont., Fort Benton—An election will soon be called to vote bonds for curbing, paving, etc., in improvement districts Nos. 1 and 2; engineers estimate cost to be \$140,000; address city clerk.

Mont., Great Falls—Hearing Dec. 22, on paving of 4th, 5th and 6th sts., and grading of 5 blocks on 11th st.; address city clerk.

Mont., Missoula—Bids received by City Clerk Smith until Jan. 14, for paving Main st. from Pattee to Woody, the district being No. 29; plans will be prepared at once by City Engineer Buck.

Neb., Kearney—Bids for paving will be delayed until paving district No. 3 has been petitioned for and the ordinance passed; when bids are asked they will include brick, asphalt and concrete curbing; address city clerk.

Neb., Lincoln—Twenty petitions have been filed asking for the paving of 15th st., from A to Elm st.; address city clerk.

Neb., Omaha—Ordinances passed creating street improvement district No. 1416, for the paving and curbing of Spencer street from 14th av. to Sherman av.; creating street improvement district 1414 for the paving and curbing of 26th st. from Binney to Maple sts.; creating street improvement district No. 1415, for the paving and curbing of Charles st. from 29th to 36th sts.

Neb., Omaha—Following were the bidders on recent street and road work offered here: Chas. E. Fanning, 116 Bee building; Hugh Murray, Bee building; Commercial Land Co., Nebraska National Bank; Ford Paving Co., Brandeis Theater building; H. J. Cathroe, 503 Ware block; General Construction Co., care Joseph Salerno, 10th and Howard sts.; Samuel Friedman, Brandeis Theater building.

N. D., Grafton—Bids received by O. M. Fraser, auditor of Walsh county, until 2 p. m., Jan. 7, for constructing metal culverts.

Ore., Astoria—The widening of Astor st. at a cost of about \$75,000 is being considered by the council; also, the widening of Commercial st., 80 feet more; address city clerk.

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RESIDENCES

Notes Arranged Alphabetically by States.

Minn., Albert Lea—Fire caused loss of about \$2,500 to the Brundin & Nelson flats.

Minn., Albert Lea—Fire damaged the Nelson & Brundia flats, \$3,000.

Minn., Beaver Crest—L. N. Kahler is building a modern house.

Minn., Cambridge—A. T. Anderson is building a modern house.

Minn., Mankato—Fred Kranz will build a modern house; cost \$3,000.

Minn., Mankato—Albert Schippel is drawing plans for a \$5,000 residence for C. Olheer.

Minn., Montgomery—F. J. Kozel will build a modern residence.

Minn., Mora—Harry Quist has foundation in for new house.
Minn., Sandstone—Adolph Kiam will build a new bungalow on his farm, 28x40, full basement and hall.

Minn., St. James—Work has begun on residence for Ole Otesa.

Minn., St. Paul—A. Silver plans \$12,000 improvements and alterations to apartment house.

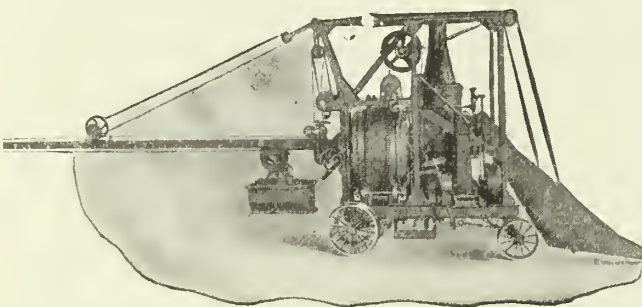
Mont., Baker—A modern residence is being erected by Davo Lloyd.

Mont., Gage—Wolf Bros. are building houses on their homesteads.

Mont., Great Falls—Permit was issued to Clearman Bros. for erection of a 1-story dwelling; cost \$2,700.

Mont., Great Falls—Peter Tentles, received permit for erection of a 1-story extension to frame dwelling, at 613 7th st. S.; cost \$200; Cozy Home Builders, 1-story frame bungalow, 1722 2d S., \$3,000; John Duncan, 1-story frame dwelling, 1120 2d N., \$1,500.

(Additional Residences on page 41)



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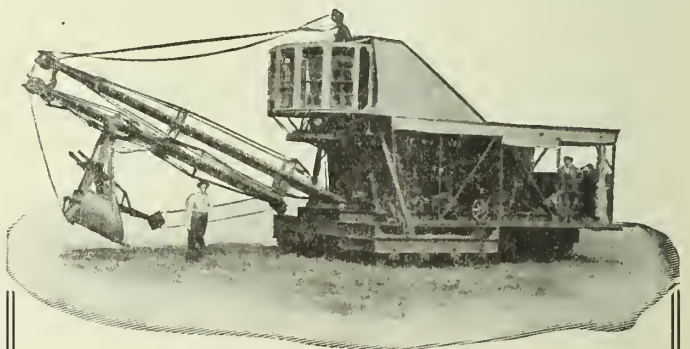
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Ore., Coquille—Coos county goods roads association has adopted a resolution favoring calling a special election to vote \$440,000 for permanent road building.

Ore., Gresham—Council street committee and county commissioners conferring in an endeavor to have county roads through the town hard-surfaced.

Ore., Portland—Petition filed for hard surface on Bas Lins road from N. end of Upper Sandy river bridge across Sandy river to Chanticleer.

Ore., Portland—Residents on Larrabee st. petitioned to extend and improve Larrabee st., at estimated cost of \$50,000.

Ore., St. Johns—Bids will soon be asked for by the council for the improvement of Willamette boul., from Burlington st. to St. John's av., estimated to cost \$25,000.

S. D., Sioux Falls—Hearing Jan. 12, on paving and otherwise improving Phillips av. from south line of 14th st. to south line of 13th st., either with creosoted wood blocks, asphaltic concrete, bitulithic, Portland cement concrete, Dolarway, sheet asphalt of tarvia; also at same time hearing on paving Phillips av., 7th to 13th st., with either granite block, creosoted wood block, asphaltic concrete, bitulithic, Portland cement concrete or Dolarway. Walter C. Leyse, city auditor.

Texas, Bay City—It is proposed to shell and gravel about 75 miles of road centering here; Oscar Barber, city clerk.

Texas, Mexia—Bids received by H. S. Bennett, city engineer, until Jan. 1, for city paving amounting to approximately \$80,000.

Texas, Mineral Wells—Citizens have voted \$200,000 for street improvements; address city clerk.

Texas, Pecos—Citizens of precincts 1 and 4 will vote on issuance of bonds to the amount of \$100,000 for the construction of good roads.

Texas, San Antonio—Out of the 12 bids submitted on different paving material here, Dec. 1, paving expert, Mr. C. D. Pollock, recommended the city council accept bid and award contract to Rushmore & Goudy, of Kansas City, Mo., to pave E. Commerce st., 32,000 square yards with vertical fiber vitrified brick, on 5-inch concrete base, at \$2.51 per square yard. Great importance was attached to this award, as it is the first contract to be let of the \$4,000,000 paving fund available by the city at this time. Fred Freies, city clerk.

Texas, San Antonio—Bids for the paving of College st. from Navarro to Losoya sts, opened and contracts soon to be awarded. Fifteen bids made by four companies as follows: Alma Paving Co., 3-inch Uvalde asphalt on 6-inch concrete foundation, \$2.31½; same specifications with 5-year guarantee, \$2.56½; 4-inch Uvalde asphalt on 5-inch foundation, \$2.71½; 4-inch asphalt on 8-inch telford foundation, \$2.31½. Texas Bitulithic Paving Co., 2-inch surface on 5-inch foundation of concrete, \$2.50. Coffeyville Brick & Coal Co., brick, with 4-inch concrete foundation, \$2.41; same with grout filling, \$2.51; 14c will be added to each increase of an inch in foundation thickness. Creosote Wood Block Paving Co., 3½-inch blocks on 6-inch concrete foundation, \$3.46; 3½-inch blocks on same foundation, with 5-year guarantee, \$3.47; 3-inch blocks on same foundation, \$3.18; same block on same foundation, with guarantee of five years, \$3.19; 4-inch blocks on same foundation, \$3.63; 4-inch blocks with 5-year guarantee, \$3.64; 3-inch blocks on 5-inch foundation, \$3.02; 3½-inch blocks on same foundation, \$3.30.

Texas, Temple—Property owners to vote at early date on proposition to issue bonds to amount of \$500,000 to lay out and survey good roads district; John G. McKay, chairman.

Wash., Clarkston—Petition will be presented to council for installation of concrete curbing and sidewalks along various streets close to business section.

Wash., Ephrata—The commissioners of Grant county have decided to spend \$19,000 on permanent state highway from this place north to run through Soap lake toward Adrian, estimated cost being \$2,500 per mile.

Wash., Kalama—Bids will be called for at once by the commissioners of Cowlitz county for the construction of a new road between Kelso and Carrolton, one of the links in the Pacific highway.

Wash., Olympia—State commission has approved plans for 26.55 miles on the Snoqualmie highway in King & Kittitas counties; also, plans approved for 15 miles of Inland Empire highway between Walla Walla and Touchet, to cost \$31,100.

Wash., Spokane—Plans completed by the city engineer for paving Boone av. at a cost of about \$8,000.

Wis., Antigo—Three blocks of asphalt paving are contemplated on Superior st.; George Palmter, city clerk.

Wis., Ashland—The county highway commissioners are planning the reduction of the grade on the White river hill on the Sanborn road; a 5 per cent grade on the south side of the hill is proposed, to cost about \$5,000.

Wis., Menasha—About three-quarters of a mile of paving is contemplated on 1st st., probably tarvia macadam; S. S. Little, city clerk.

Wis., Neenah—Six blocks of paving are contemplated for the early spring; H. S. Zemlock, city clerk.

Wis., Racine—Property owners on 15th st. between Main st. and College av., have petitioned to have the street paved with asphalt; address city clerk.

Wis., Sparta—Bids received by Thos. T. Teall, county highway commissioner, until Jan. 5, for 225 cords of hardheads, 300 cords of limestone or hardheads, and 250 cords of hardheads, each lot to be delivered at designated points.

CONTRACTS AWARDED.

Ill., Moline—Contract for paving on 10th and 11th avs. let to McCarthy Improvement Co., Davenport, Iowa.

La., Lafayette—Contract awarded to C. R. Scharf & Co., Bristol, Tenn., for constructing 15 miles of cement side walks, with curb or combined curb and gutter, at \$61,000. Other bidders were D. E. Golyer & Co., Seymour, Ind., \$80,000; J. B. Silver & Son, Abbeville, \$88,000; C. S. Jackson & Co., New Iberia, \$91,000; R. L. Savage, Asbury Park, N. J., \$95,000; J. J. Underwood & Co., Springfield, Mo., \$101,000; L. J. Voorhies, city engineer.

Minn., Grand Rapids—Contract has been let to J. M. Dowling, Duluth, Minn., for the construction of the Blackberry-Warba highway at \$5,000.

Minn., Granite Falls—Contract for constructing state rural highway No. 1, has been awarded to J. Sampson, of Sioux Falls, S. D., at \$67,070. This contract calls for approximately 70,806 cubic yards grading, 68,779 lineal feet turnpiking, 25,496 cubic yards graveling and erecting 5 bridges as follows: a 40-foot reinforced concrete, a 25-foot I-beam span, a 40-foot plate girder and 20-foot, I-beam span bridges, 6 concrete culverts and 122 corrugated iron culverts.

Minn., Kasson—Contract with the International Harvester Co. for a gas traction engine at \$2,355. Other offers were as follows: Kinnard & Haines Co., \$2,400; Avery Co., \$2,292; Minneapolis Steel & Machinery Co., \$2,800; Pioneer Tractor Manufacturing Co., \$2,750; and Rumely Products Co., \$2,547. Contract with J. D. Adams & Co., for two road graders at \$1,480. Other offers were: The Austin-Western Co., \$1,300, and the Russell Grader Manufacturing Co., \$550.

Minn., St. Paul—Grading contracts have been awarded recently as follows: Hewitt av. from Griggs st. to Lexington av., Keough Bros., \$1,600; an alley in block 2, Hamline Syndicate second addition, Keough Bros., \$198; Hubbard st. from Syndicate av. to Griggs st., Christ Johnson, \$359.56; grading Topping av. from Syndicate av. to Griggs st., Keough Bros., \$600; Marlboro av. from Dayton to Portland av., Christ Johnson, \$3,811.69.

Mont., Bozeman—Contract with S. Birch & Co. for construction of cement sidewalks in College st. improvement district, involving about 15,000 square feet of walks.

Ore., Portland—Contract with the Warren Construction Co. for paving Broadway from Larabee to Wheeler st., at \$10,530; also, with Bechill Bros. for grading and concrete walks and curbs in 59th av. SE., at \$4,566; also for bitulithic pavement on Belmont st., E. 19th to E. 20th, to the Warren Construction Co., at \$4,577.

Ore., Portland—Contract for grading and setting concrete curbs on Knowles av., awarded to the Cochran-Nutting Co. at \$5,579.

Texas, Temple—Contract to O. C. Chapin, Kansas City, Mo., for paving Adams av. with brick, at \$1.95 per square yard.

Wash., Seattle—Contract for grading 39th av., etc., awarded to S. Normile for \$46,354.

Wash., Tacoma—Contract to W. H. Hicker, 1002 N. Ainsworth av., for grading and sidewalks along E. G st., from 38th to 48th st. at \$10,313. The bid of the McHugh Contracting Co. was \$10,576.

BRIDGES

Notes Arranged Alphabetically by States.

Iowa, Atlantic—Board of supervisors resolved to construct culvert in Noble township, estimated cost \$385; C. C. Smith, chairman.

Iowa, Boone—Special election will be held to Jan. 15, to vote \$10,000 school bonds.

Iowa, Montezuma—County board resolved to build 16 concrete steel bridges; objections Dec. 29; W. C. McKee, county auditor.

Iowa, Muscatine—Much bridge construction work will be done in 1914 in this county, estimated cost \$25,000; County Engineer Ryan will make the preliminary surveys for road and bridge improvements.

Minn., Alexandria—Matis Clark of Belle River reports that bridge across Long Prairie river near Cragg farm ought to be condemned. Board will act at January meeting. E. J. Brandt, county auditor.

Minn., Litchfield—County board postponed action in regard to county aid for bridges for village of Litchfield until the January meeting. T. Sullivan was awarded contract for furnishing corrugated steel culverts for state road No. 2.

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Minn., Sartell—Election Jan. 10 to vote on issuing bonds for a bridge over the Mississippi just below the dam of the Watab Pulp & Paper Co., state aid will be secured also.

Minn., Stillwater—Council is considering a brick or concrete culvert, a steel or wooden bridge to replace the Everett st. bridge or the bridge may be repaired. F. M. Bordwell interested.

Mont., Helena—A number of bridges and culverts will be constructed on the electric line from here to Hauser Lake. Frank J. Edwards, chairman.

Neb., South Omaha—City officials and representatives of the Burlington railroad are going over sites for proposed viaducts at the foot of O st. and one at 42d st.; Engineer Beal and Mayor Hootor favor these bridges.

N. D., Beulah—Railroad company are erecting a dam across Knife river directly south of here, it will be 30 feet high and will make a backwater of over two miles, necessitating the erection of a bridge.

Wis., Manitowoc—County board has been petitioned for a joint county bridge by Manitowoc, Brown and Kewaunee counties that said bridge span the Nesoto river; estimated cost \$3,200.

CONTRACTS AWARDED.

Mont., Miles City—Security Bridge Co., Minneapolis, have contract to build three bridges on Little Powder river at \$19,053.

Mont., Missoula—J. F. Harrington received contract for cribbing at the county bridge for \$5,999.

Mont., Poplar—Zelch & Walton, northwestern agents for the Illinois Steel Bridge Co. have begun work on bridge over Poplar river.

S. D., Bruce—The Iowa Bridge Co., Des Moines, was awarded contract for building all bridges for the year 1914.

S. D., Fairfax—Standard Bridge Co., Omaha, awarded bridge contracts for next year.

S. D., Salem—Concrete for concrete bridges for the year let to W. A. Barnhart Construction Co.

S. D., Wood—Contract to Western Bridge & Construction Co. for building bridges for next year.

Wis., Ashland—Contract for building approaches for new bay front bridges let to Eben Olson at \$7,000.

Wis., Green Bay—Contract for main street bridge to Greiling Bros., Green Bay for \$3,500. It will be steel bascule.

Wis., Washburn—Contract for approaches to steel bridge at head of Fish Creek was awarded to Eben Olson, Port Wing. Hennepin Bridge Co. who have contract for two steel bridges have begun work.

granting West Side sewer petition, to be built next year at a cost of \$100,000.

Minn., Cuyuna—Bonds for \$15,000 have been sold for the construction of a sewer system and James G. Lawson, Duluth, secured to prepare plans and superintend the work.

Minn., Hibbing—Bids received by D. D. Haley, village recorder, until 3 p. m., Dec. 23, for 1,200 feet of 12-inch salt glazed vitrified clay sewer pipe, including 90 6-inch house connections.

Minn., Hibbing—The village recorder has been ordered to advertise for bids for sewer pipe for the residents of Brooklyn to have sewer connections early in the spring.

Minn. St. Paul—Bids received by Leonard C. Seamer, clerk board of public works, until 2 p. m., Dec. 30, for the Woodlawn-Fairmount system of sewer; check for 10 per cent.

Mo., Memphis—Bids received about Jan. 5, for vitrified pipe sewers to cost \$20,000; Rollins & Westover, engineers, Midland building, Kansas City, Mo.

Mo., Springfield—City will soon award contracts for sewers; C. E. Phillips, city engineer.

Mont., Fort Benton—Special election Jan. 30 to vote on \$33,000 bond issue for sewer work; address city clerk.

Mont., Harlowtown—Council contemplates a sewer system under district improvement plans, to include trunk line and laterals; address city clerk.

*Mont., Helena—Bids received by J. A. Mattson, city clerk, until 8 p. m., Jan. 5, for a storm sewer on Boulder av. from Roberts st. east to concrete storm sewer on Sanders st.; check for 10 per cent.

Neb., North Platte—Work has been started for the new sewer for the Union Pacific roundhouse.

Neb., Ravenna—Election soon to be held to vote on issuing bonds for \$21,000 for a sewer system; Grant & Fulton, engineers, Security Mutual building, Lincoln, Neb.; C. B. Cass, city clerk.

Neh., Scottsbluff—Bids received by G. L. Shumway, city clerk, about Feb. 1, for construction of 8 and 10-inch pipe sewers and gravity sewage disposal plant, 15-inch main, to cost about \$22,000; Yoder & Liljenstolpe, engineers, city.

..Okla., Atoka—Bonds for \$30,000 have been voted for a sewer system; C. M. Neal, mayor.

Ore., Enterprise—Plans being prepared for installation of a new sewer system to serve the whole city.

S. D., Huron—Election Jan. 20 to vote \$22,000 for securing a site constructing, installing and equipping a mechanical gravity filter plant to increase the water supply of the city; address city clerk.

S. D., Yankton—Bids received by John W. Summers, city auditor, until 7:30 p. m., Jan. 5, for a lateral sewer along the alley which runs through block No. 4, north and south in that part of the city known as "Yankton."

Texas, Dallas—Plans for a sewage disposal plant have been completed by Jas. H. Fuertes, New York City.

Wash., Bremerton—Plans being prepared by J. Curtis Adams, city engineer, for sewers to cost \$10,000.

*Wash., Puyallup—Contract with S. R. Gray for installing sewers in improvement district No. 38, at \$1,362.

Wash., Winlock—The extension and improvement of the sewer system is under consideration, to cost between \$6,000 and \$8,000; B. Quillen, city clerk.

Wis., Beloit—The council is considering a sewer for the west side of the city to cost in the neighborhood of \$70,000; R. R. Caldwell, city engineer.

Wis., Chippewa Falls—Hearing Jan. 19, on plans for sewer district known as sub-district No. 2 of the general sewer plan of the city; J. T. Tuohy, chairman of the board of public works.

Wis., Fond du Lac—Bids received by J. F. Hohensee, city clerk, until 3 p. m., Dec. 30, for a sanitary sewer in Lewis st.; check for 5 per cent.

Wis., Oshkosh—City contemplates laying 500 feet of 24-inch vitrified pipe in spring in Oregon st.; Dan Witzel, city clerk.

Wyo., Fort Yellowstone—Bids for an outfall sewer rejected; will be re-advertised next year; address the quartermaster.

CONTRACTS AWARDED.

Ida., Emmet—Contract to Parrott Bros., Salt Lake City, Utah, for a sewer system at \$12,744.

Iowa, Bloomfield—Contract for sanitary sewers to M. Tsch-

SEWERS

Notes Arranged Alphabetically by States.

Ariz., Clifton—City council has decided to install sewers in the Chase Creek district.

B. C., Vancouver—Bids received as follows by the Burrard Peninsula Sewerage Commission for the extension of Canal and Chlna Creek sewers: S. J. Lund & Co., city, monolithic pipe, \$240,098, concrete pipe, \$245,784; D. McLean, monolithic, \$264,350, concrete, \$258,800; John Galt & Co., monolithic \$264,370, concrete, \$268,862; Storrie & Co., monolithic, \$265,860; Union Contracting Co. monolithic, \$283,745, concrete, \$285,670; Ledingham & Cooper monolithic, \$353,100, concrete, \$359,612. The work includes 10,000 feet 4 to 6-inch sewer, both trench and tunnel work; A. D. Creer, engineer, 119 Pender st.

Ida., Boise—Plans under way for proposed sewers in South Boise; O. C. Stevens, city engineer.

Iowa, Alden—Plans are before the city council prepared by M. Tschirgi & Sons, Cedar Rapids, Iowa, for proposed sewer work to cost \$14,000; hearing to be held Jan. 2.

Iowa, Burlington—Plans are being prepared by H. G. Vollmer, city engineer, for a sewer system in the Prospect Hill district.

Iowa, Osage—Bids are being received from engineers for the proposed sewer work here; total amount recently voted on was \$75,000; address city clrk.

Iowa, Stafford—This town is preparing to install a complete sewer system; address city clerk.

Kan., Topeka—Commissioner W. G. Tandy recommends

irgi & Sons, Cedar Rapids, Iowa, at \$3,350, requiring 1,700 feet of 6-inch tile at 50c per foot and 2,965 feet of 8-inch tile at 58c.

Mo., Kirksville—Contract to S. L. Eggert for sewers in districts Nos. 93, 94 and 95; Audrey D. Risdon, city clerk.

Neb., McCook—Contract with the McCook Cut Stone Co., city, for a concrete septic tank at \$2,797.

DRAINAGE AND IRRIGATION

Notes Arranged Alphabetically by States.

Ia., Caldwell—H. L. Fisher has appeared before the state land board and asked permission to launch an irrigation project in Canyon county. The land to be irrigated lies adjacent to this city and contains approximately 2,500 acres. The plan is to irrigate the land from a large body of underground water by a pumping system. Owing to the uncertainty of the permanency of the underground water, the state land board has taken the matter under advisement.

Iowa, Muscatine—Argument completed on petition for rehearing by Supreme Court of No. 13 ditch case; Muscatine and Louisa county boards estopped from letting contract on ditch and power plant until case is decided.

Iowa, Nevada—Hearing Jan. 15, on proposed ditch, petitioned for Wm. J. Gilmore and others.

Iowa, Northwood—County auditor authorized to advertise sale of drainage bonds in district 14.

Iowa, Onawa—Bids received until Jan. 2, 12 m., for Hamm tile drain 16.

Iowa, Sidney—County Treasurer McKean will receive bids for \$22,000 drainage bonds Dec. 29, 10 a. m.

Minn., Alexandria—Ditch 19, will be cleaned by private parties.

Minn., Fairmont—County Treasurer Haeckel received \$51,000 proceeds drainage bonds, sold to the state; \$123,000, is wanted.

Mont., Havre—Irrigation dam is being constructed at Poor Farm near Pacific Junction.

Mont., Helena—According to state engineer, A. W. Mahon the Carey land board is entering into contracts for the construction of two more irrigation projects. One is in Custer county on the Little Missouri and will be built by a company composed of Butte people. The project will reclaim about 20,000 acres of land. The other is to be in Fergus county and will not be as large.

Neb., Lincoln—The city engineer submitted the plans and specifications for the construction of the city's part of the Antelope conduit and the commissioners' approval was given. The commission authorized the clerk to advertise for bids for the work, amounting to \$10,740. The city is to pay \$10,000 of this amount.

Neb., McCook—Many additional pumping plants for raising water from shallow wells in the Platte and the Republican valleys are projected; H. N. Darton, U. S. Geological Survey, recently made investigation of the underground water supply available for irrigation, at request of Congressman S. R. Barton.

Neb., North Platte—Engineers C. J. McNamara and J. C. Hogs, have returned from Bergwood district after inspecting irrigation of power engineering work.

Neb., Tekamah—C. H. W. Bussee and W. J. Griffin, Decatur, F. A. Cameron and F. C. Houston, Tekamah, are committee on petitions for forming new drainage district; will meet Jan. 6.

Neb., Wakefield—Plans completed by Toll Engineering Co., Omaha, for Wakefield drainage district; preliminary survey completed.

N. D., Lakota—Bids received until 2 p. m., Feb. 3, 1914, for construction of county drain 1; all bids must be filed with Jacob Franzen, secretary, Mapes, N. D., route 1.

Wyo., Cody—Arrangements are being made for the consummation of the Wiley ditch project, which has hung fire for a long time. Senator Taylor of Cheyenne, H. E. West of Independence, Kan., W. J. Herman of Kansas City and Marquis de Boemont and F. P. Gross of Paris, France, have gone over the project, and it is stated that the project has been financed by French bankers. A great deal of preparatory work is to be done this winter, but actual construction work on the project will not be undertaken until next spring.

CONTRACTS AWARDED.

Iowa, Iowa Falls—Contract awarded to Blackmore & Harris, Nevada, Iowa, for material and construction of drainage district 1; Hardin and Franklin Co.; will use Monmouth Mining & Manufacturing Co. tile.

Iowa, Spencer—Contract awarded for tile drainage district 25, to Cement Products Co., Spencer. Contracts for tile district 26, and construction to same company.

WATER WORKS

Notes Arranged Alphabetically by States.

B. C. Vancouver—Council authorized the expenditure of \$240,000 for curbs, sewer and water mains next year.

Iowa, Garner—This town is without fire protection. A fire at the pumping station rendered that useless. The pumping was done by electricity and the machinery is in bad condition.

Iowa, Moulton—Council contemplates the construction of a water works system.

Iowa, Perry—Special election Jan. 6, to vote on water works bonds for \$35,000; Adrian Cross, city clerk.

Iowa, Sanborn—Election Dec. 27, to vote on issuing bonds for \$10,000 for water works.

Iowa, Sioux City—Councilman Healey recommends a \$500,000 water plant.

Minn., Sanborn—Election Dec. 27 to vote on issuing bonds for \$9,000 for construction of a water works system; D. G. Klein, recorder.

Mont., Hardin—B. C. Lillis, engineer, employed by council for water works estimates cost at \$25,000; F. M. Lipp, city clerk.

Mont., Lewistown—Bids received by H. L. Fitton, city clerk, 4 p. m., Jan. 5 for furnishing 40 tons of cast iron pipe class "C," and specials class "D;" check for 10 per cent; for further information write city engineer. Bids will be taken at same time and date for 12 Eddy hydrants; check for 10 per cent.

Neb. Mead—Bids for construction of water works system received Feb. 1; the work includes two pressure tanks, 9x30, a 10-inch well, 7,000 feet of mains and a 25 h. p. oil engine; Bruce & Standevan, engineers, Omaha.

Neb., Morrill—Nothing will be done about municipal water works until spring; A. A. Kearney, city clerk.

Neb., Scottsbluff—Bids received Feb. 1 for 6 and 4-inch cast iron pipe, special and fire hydrants by G. L. Shumway, city clerk; cost \$15,000; Yoder & Liljenstolpe, engineers, Scottsbluff.

Neb., Superior—Bonds for \$22,000 were voted for water works.

S. D., Bruce—Agitation has started for better fire protection.

S. D., Huron—Agitation has started for a bond issue for a filtering plant.

S. D., Sioux Falls—Contract for sewer and water connections let as follows: Ferris & Sons, Sioux Falls, Phillips av., 12th st. to 18th st.; J. O. Fowler, Sioux Falls, Prairie av., 3d st. to 12th st.; Chas. McGovern, local man, Minnesota av., Walter Leyse, city auditor.

Wash., Warden—Bids will be received Jan. 15 for tower and tank with steel pipe etc. for municipal water works; cost \$3,000; E. E. Rockhold, engineer.

Wis., Altoona—Louis G. Arnold, consulting engineer, recommends the building of a station on the bluff near town and a reservoir; Chas. G. King, mayor.

Wis., Green Bay—Herman Smits and Jos. Weber have about completed concrete reservoir.

Wis., Green Bay—Herman Smits and Jos. Weber have about completed concrete reservoir.

Wis., Kenosha—Council will call an election to vote on bonds for \$100,000 for a filtration plant.

CONTRACTS AWARDED.

Minn., Ireton—Pastoret Co., Duluth have started work on the 85,000-gallon water tank.

Neb., Minatare—Contract for water works to J. S. Schwartz, Colorado Springs, cost \$13,472.

Wis., Nekoosa—Contract for 4-inch water main let to H. E. Herrick at \$1 per foot.

ELECTRICAL

Notes Arranged Alphabetically by States.

Iowa, Montezuma—Commercial club are considering installing electroliers.

Iowa, Reliance—Farmers in this vicinity are considering building a telephone line into this town.

Iowa, Burlington—Iowa Utilities Co., organized to build a line from West Burlington through Danville, Mt. Pleasant and Rome to Fairfield. R. M. Burtiss, Chicago, president; transmission line to be built in spring.

Iowa, Dennison—An election will be held to vote bonds for purchase of electric light plant and improvement of same.

Iowa, Remsen—Agitation has started for electroliers on business streets.

Iowa, Shelby—Franchise granted to the Avoca Electric Light & Power Co. of Avoca.

Minn., Bena—Bids received by V. W. Chandler, clerk, 8 p. m., Dec. 29, for four gasoline street lights.

Minn., Clara City—Electric light bonds have been voted and the lights will soon be installed.

Minn., Ellsworth—Earl D. Jackson, Capital National Bank building, St. Paul, consulting engineer, is making plans for a light plant here.

Minn., Floodwood—Commercial club appointed committee to investigate cost municipal electric light plant and water system.

Minn., Howard Lake—Preliminary plans are being made by the Electric Short Line; Col. Luce, owner, for a line through this place.

Minn., Monticello—Franchise granted to Theo. Kautt and brother of St. Paul, incorporated under the name of the Monticello Electric Light & Power Co., for installing and equipping an electric light plant. Work to begin at once.

Minn., St. Paul—Adolph Meyer, consulting engineer, Germania Life building, is making plans for a power plant at the head of Dixie Gulch.

Mont., Butte—A transmission line will be built by the Montana Power Co., to the property of Butte & Great Falls Co. at the head of Dixie Gulch.

Mont., Dillon—Union Electric Co. are installing two large turbine wheels at old plant and at greater plant a new wheel will be installed and a capacity raised to 360 horsepower, this company owns 11 miles of transmission lines.

N. D., Casselton—Franchise granted to Hallett & Lynch for installing an electric light plant and street lights W. T. Sprake, city auditor.

N. D., Hazen—Wm. Welch and Chas. Wright of the Knife River Telephone Co., are endeavoring to interest local men in their telephone stock and telephone system.

N. D., La Moure—Bids received by O. C. Temple till 2 p. m. Jan. 6, for wiring court house for electric lights; check for 5 per cent.

Ore., Eugene—Geo. S. Edmonton, engineer for the Oregon Electric Co. has completed preliminary survey for the development of 45,000 h. p. within the next 5 years at Clear Lake, 75 miles from here.

S. D., Bruce—An effort is being made for an electric light plant.

Wash., Seattle—The Puget Sound Traction Light & Power Co., has received a franchise from the council along the country roads between here and Lake Forest Park. The company has also asked for a franchise for a line between Kirkland and Redmond; Geo. P. James, engineer, Seattle, A. H. Dimock, city engineer has asked for an appropriation of \$75,000 for completion of division A of the municipal street. railway.

Wash., Tacoma—Application for a charter has been made by Tacoma Transit Co. to build an electric railway in Tacoma. Capital \$30,000; J. Grant Hickel and Geo. Everett.

Wis., Altoona—Council granted a franchise to C. V. Railway L. P. Co., for street car lines in city to be void if cars are not running within a year.

Wis., Lancaster—Lancaster Electric Light Co. has been reorganized and name changed to Lancaster Light & Power Co. and capital increased to \$100,000. H. L. Clark elected president. Work on extension line to Fennimore will begin at once.

Wis., Madison—It is reported that the Wisconsin Telephone Co. will build an addition to their exchange; R. C. Seymour, general manager.

Wis., Madison—State railroad commission refused permission to Sharon Telephone Co., to build a line from Stevens Point to Rosholt.

Wis., Rhinelander—Chas. Gross, town of Pelican, has taken over the portion of the old telephone line from the city to Bundy and will remodel same and extend the lines.

Wis., Sheboygan—City has asked permission to establish a municipal lighting plant.

Wis., Superior—The Superior Steel Plant Traction Co. was given permission to build care line between South Superior and steel plant. Work to begin in spring.

CONTRACTS AWARDED.

Minn., Ortonville—J. A. Anderson has contract to install electric system at Big Stone.

Mont., Billings—Gagnon & Co. awarded contract for excavation for Montana Power Co.'s new building; Link & Haire, Helena, Mont.

Mont., Deer Lodge—B. M. Rogers was awarded contract to grade 49 miles of electric road out of Idaho Falls, Ida., at \$50,000.

PUBLIC BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Calgary—City council proposes to carry out plans for the new armory.

Alta., Edmonton—Bids have been called for on the construction of the new arts building which is to form the central and most imposing unit in the arrangement of buildings which go to make up the provincial university; plans by Nobbs & Hyde, architects, Montreal; resident architect, C. S. Burgess; to be 300 feet long by 70 feet wide, base and steps of granite, dressed stone trim, parapets of terra cotta; stone carving and sculpture to increase artistic effect; main construction to be of steel and concrete, fireproof; details later.

Colo., Grand Junction—Fred Jenkins, architect, is preparing plans and specifications for the proposed police station and a site has been purchased.

Ida., Pocatello—Bids for the U. S. postoffice building here were received as follows: H. E. Doering, Portland, Ore., limestone \$93,174; sandstone \$94,218. Palmberg & Mattson, Astoria, Ore., limestone \$93,575; sandstone, \$94,675. Parrott Bros. Co., Salt Lake City, Utah, limestone, \$95,617; sandstone \$96,000. Campbell Building Co., Salt Lake City, limestone \$98,338; sandstone \$98,338. Northern Construction Co., Milwaukee, Wis., limestone, \$98,860; sandstone, \$100,900. North Pacific Construction Co., Twin Falls, Ida., limestone \$106,500; sandstone, \$106,500.

Iowa, Dubuque—All bids rejected for plumbing, conduit and wiring for United States postoffice building; new bids to be asked for in near future. Address Oscar Wenderoth, supervising architect, Washington, D. C.

Iowa, Eagle Grove—Plans have been completed for the city hall and fire station by J. G. Albright, architect, Fort Dodge, Iowa; 50x88, 2-story, brick; cost about \$77,000; foundation of brick and cement, pressed common brick, Bedford stone, gravel roofing, metal cornice, common and plate glass, stucco plaster, steam heat, etc.

Iowa, Lyons—Council again discussing site for the proposed fire station; address city clerk.

Iowa, Muscatine—Bids received by the city recorder until Jan. 29 for construction of city hall building; 40x106, 2-story and basement, cost \$85,000. Jos. E. Mills, architect, 510 Washington Arcade, Detroit, Mich.

Ill., Edwardsville—Plans approved for Madison county's \$250,000 court house. R. G. Kirsch, 4067 Magnolia av., St. Louis, Mo. M. Mackinaw, county clerk.

Ill., Olney—Bonds have been voted for a 3-story \$85,000 court house contemplated by Richland county. Address county auditor.

Kan., Horton—There has been \$15,000 voted for a modern city hall building; address city clerk.

Kan., Iola—Matter of erecting a county jail and sheriff's residence will be submitted to the people at the next general election; address city clerk.

Kan., Topeka—Plans and specifications for fire station in North Topeka completed by L. M. Wood, architect, estimated cost to be \$17,500; 2-story, brick and reinforced concrete; will advertise for bids about Jan. 1; separate contracts for heating, plumbing and wiring.

Kan., Topeka—L. M. Wood, architect, will prepare plans for the Garfield Park rest room.

Ky., Taylorsville—Bids received by Samuel K. Bird, county judge, until Dec. 31 (postponement), for the erection of the court house.

Mich., Traverse City—Bids received by Oscar Wenderoth, supervising architect, Washington, D. C., until Jan. 2, for the metal vault shelving in the United States postoffice here; plans and specifications. Also by the same, until Dec. 30, for metal vault shelving at Lead, S. O. Also by the same until Jan. 6 for metal vault shelving for postoffice at Mineral Wells, Texas.

Minn., Albert Lea—County commissioners have selected sit for the proposed new building at the county farm; C. E. Brainerd, county auditor.

Minn., Brainerd—It is suggested that it may be economy to build a new court house now, since a jail must be built at once.

Minn., New York Mills—The first hall has been destroyed by fire; address city clerk.

*Minn., Perham—Bids received by Paul Miller, recorder, until 8 p. m., Jan. 12, for one 18x72 boiler. See official advertisement in this issue of the Bulletin.

Mo., Boonville—Bids received by Oscar Wenderoth, supervising architect, Washington, D. C., until 3 p. m., Feb. 11, for the U. S. postoffice building at this place; 1-story and basement, fireproof construction except roof; plans from Richards, McCarty & Bulford, architects, Hartman building, Columbus, O., or from the supervising architect.

Mo., Richmond—The \$100,000 bond issue for the new court house for Ray county carried; address city clerk.

Mont., Butte—Bids will be asked for on the improvement of the city hall soon; plans are being prepared by Architect Howell.

Mont., Dillon—Plans for a \$2,000 city hall to be built next spring have been approved by the council; address city clerk.

Mont., Havre—City is discussing erection of a city jail; address city clerk.

Mont., Plentywood—Steps being taken for building a fire hall, gymnasium and commercial club room; address Geo. F. Bolster for information.

Mont., Roundup—J. R. Grant has been commissioned to draw plans for a new jail; if approved, bids will be advertised for immediately; address city clerk.

Neb., Seward—The county jail has been condemned by the state authorities.

Neb., University Place—Bids will be advertised for next month for the city hall and fire station to cost from \$13,000 to \$15,000; plans completed by J. R. Smith, architect, Nebraska State Bank, Lincoln, Neb.; C. C. Gates, city clerk.

Ont., Fort Francis—The grand jury recommend better jail accommodations to be erected adjoining the present building.

Ont., Fort William—Work will begin next spring on foundation of new custom house; material all being procured.

Ore., Albany—Bidders for the postoffice here were as follows: Fred A. Erixson, Salem, Ore., limestone, \$58,975, sandstone, \$57,650; Palmberg & Mattson, Astoria, Ore., limestone, \$62,390, sandstone, \$62,390; Sound Construction & Engineering Co. Seattle, limestone, \$63,869, sandstone, \$61,869; J. H. Wise, sandstone, \$64,770, limestone \$63,180; J. H. Tillman, Portland, limestone \$74,400, sandstone \$74,400; George Isackson, Portland, limestone \$75,000; Arthur W. Kutsche, Portland, limestone \$76,000, sandstone \$76,000; Campbell Building Co., Salt Lake City, Utah, sandstone \$57,776.

Ore., Portland—Building Inspector Plummer is preparing plans for adding a story to part of the city hall, making a semi-circular room.

Sask., Saskatoon—Geo. Foley, contractor, has completed excavation for the new government elevator.

Texas, Abilene—Plans for county court house to cost \$150,000 have been approved by county commissioners; bids to be called for at once; address county auditor.

Texas, Galveston—Property owners voted issuance of bonds to amount of \$900,000 for the following purposes: fire boat, \$75,000; city hall building, \$300,000; equipping and repairing public school buildings, \$20,000; increasing water supply of city and extending sewer system, \$150,000; paving, draining and otherwise improving streets, \$150,000; paving, draining and otherwise improving the streets in a section of the West End, \$25,000; address city clerk.

Utah., Gunnison—Bids received by Neil Sorenson, city recorder, until Jan. 3, for re-construction of city hall; work will consist of new roof, floors and ceilings, stairways, two new outside windows lintels, interior door lintels, supporting structure for bell, and all necessary doors and windows.

Wash., Monroe—Bids received by H. W. Rose, secretary board of managers Washington state reformatory, Monroe, until noon, Jan. 13, for steel doors, operating device for same, steel partitions and guard's cage circular stairway; plumbing fixtures, pipe and fittings; electrical material; water tanks and supports, etc., and for supplying material and labor for sheet metal heating and ventilating system; check for 5 per cent.

Wash., Port Orchard—An active movement has been started for a \$75,000 court house; address county auditor.

Wis., Delavan—Van Ryn & De Gelleke, architects of Milwaukee, have been employed to prepare plans for a new jail.

***Wis., Madison**—Bids received by Lewis F. Porter, secretary, until noon, Jan. 27, for excavation and foundation work for portions of the state capitol; check for 5 per cent. Officially advertised in this issue of the Improvement Bulletin.

Wis., Wycocena—Plans for a \$25,000 county house have been submitted by A. D. Conover, architect, Madison, Wis., and the committee will recommend the same to the county board at its meeting next month; address county auditor.

CONTRACTS AWARDED.

Kan., Greensburg—Contract for the court house in Kiowa county has been awarded to the St. Joseph Construction Co., Hutchinson, Kan., at \$43,567. Other bidders were Billings & Fielding, Guthrie, Okla., \$48,870; Green, Kirkland & Hill, Fairbury, Neb., \$52,842; F. M. Spencer & Son., Topeka, Kan., \$46,326; Clarence Johnson, Manhattan, Kan., \$50,597; J. A. Mathein, Anthony, Kan., \$56,985; Shaw & Frankengeld, Enid, Okla., \$46,081; Stanffer Construction Co., Wichita, Kan., \$43,891.

Kan., Kansas City—Contractor R. A. Matthews, Grand Junction, Col., who has contract for the court house here has given the contract for the cut stone work to the Reed Stone Co., Bedford, Ind.

Minn., Waseca—Contract to build the assembly hall and

feed shed at the state experimental farm has been awarded to Fischer & Arnold at \$5,860.

Mo., Jefferson City—Contract for 5,200 tons steel for the new state capitol has been let by the general contractors, John Gill & Sons, with the Christopher & Simpson Iron Works Co., St. Louis, Mo., Hanley & Casey will put in the heating plant.

Mont., Cascade—Contract with Sieber & Burnquist by the city council for a fire house, 14x20.

Okla., Muskogee—Contract has been awarded to the G. A. Kees Domestic Engineering Co., 262 E. 7th st., St Paul, Minn., for the erection of the federal postoffice and court house here, at \$49,357. Other bidders were: Newport Construction & Engineering Co., Newport News, Va., \$52,984; Farwell Heating Co., Atchison, Kans., \$55,000; S. Faith & Co., Philadelphia, Pa., \$55,497.

S. D., Lead—Contract has been let to Mullen & Rourke for converting the Alert hose house into a fire station at \$3,379. Other bids were Rasmussen Bros. \$2,850; O. A. Ellis, \$3,386; Barnett & Ramsey, \$2,759.

Wis., Madison—Contract for excavating for the new north wing of the capitol and for the foundation cement work was awarded to George Nelson, city, at \$16,985. Other bidders were: John T. Blake, Madison, \$20,750; J. W. Mitchell, Madison, \$17,000; Baker & Roherty Madison, \$22,987; George A. McAvoy, Chicago, \$28,817; M. Hayes & Sons, Janesville, \$30,000; Nicholas Quinn, Madison, \$19,995; Weber & Gay, Madison, \$23,850. Steel work on the superstructure already let to the Worden-Allen Co., of Milwaukee, and the granite work to the Woodbury Co., the concern which has done the other wings and is now doing the dome.

HOTELS AND HOSPITALS

Notes Arranged Alphabetically by States.

Alta., Edmonton—An institution for mentally defective children will be erected by the Children's Aid society; H. P. Locke, treasurer.

B. C., Vancouver—Hospital board is planning an addition to the general hospital at an estimated cost of \$200,000.

Colo., Denver—C. Elle will erect a 4-story hotel at 14th and California at a cost of \$65,000; Geo. L. Bettcher, architect, Empire building.

Ida., Coeur d'Alene—Buthedge Lumber Co. will build a 75-room boarding house in spring near site of proposed mill.

Idaho, Idaho Falls—B. M. Rogers, Red Lodge, Mont., is having plans drawn for a 4-story hotel here, the basement of which is now in process of excavation.

Ida., Lapwai—H. L. Wright plans erection of a cement block hotel on Main st., 2-story.

Iowa, Anamosa—Plans are in progress by C. A. Dieman & Co., architects, 405 Granby building, Cedar Rapids, Iowa, for remodeling the Hotel Gillon.

Iowa, Creston—The Summit house damaged by fire to the amount of from \$4,000 to \$6,000.

Iowa, Decorah—Competitive plans will be received by the secretary of the National Bank of Decorah until noon, Jan. 30, for the Aase Haugen Old People's home, to cost approximately \$25,000; address H. C. Hjerleid.

Iowa, Dubuque—The new hotel has been agreed upon and it is believed the contract can be let soon; the building will be 8-story, above basement and cost \$450,000; there will be 250 guest rooms; construction to be fireproof as far as possible.

Iowa, Manson—The hotel is being improved by an addition in the rear and a veranda in front.

Kan., Wichita—Final plans for Travelers' hotel approved; 30 days probably will be allowed for contractors to submit bids; hotel to be of steel construction and will be 6-story; structural work heavy enough for additional stories.

Man., Winnipeg—Mac Rochon announces that he will tear down the Leland hotel in the spring and erect on the site a \$500,000 hotel of beautiful design.

Mich., Iron River—The Boyington house has been purchased by Allie T. Wooster, Rhinelander, Wis., and in the spring will build a 4-story modern hotel to cost \$100,000.

Minn., Granite Falls—The Commercial Club has been considering sanitarium proposition for Yellow Medicine, Chipewa and Renville counties; K. E. Neste, chairman of committee having matter in charge.

Minn., Hibbing—The federal government will soon begin construction at Nett Lake agency of a general hospital, estimated to cost about \$5,000; Indians will get out the timber.

Minn., Mesaba—A hospital is to be built here by Dr. Bray of Biwabic.

Mont., Ekalaka—Mr. Ramme has begun an addition to his hotel; a number of new rooms will be added.

Mont., Poplar—Dr. Harry G. Harris will erect a hospital of 12 to 20 beds; architect not selected; will build in the spring.

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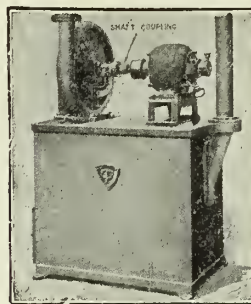
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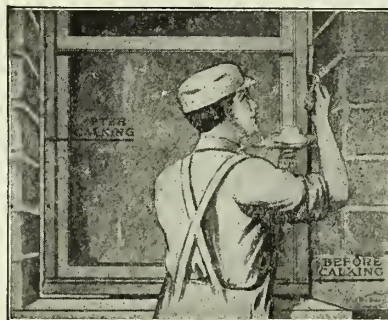
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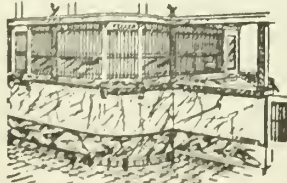


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Ore., Pendleton—Plans being prepared by Tourtellotte & Hummel, architects, Northwest building, for remodeling and addition to Pendleton hotel, at estimated cost of \$35,000.

Ore., Portland—C. W. Fulton and W. B. Streeter have purchased site for a family hotel and will build when suitable lessee is found.

Wash., North Yakima—Norman Bros. lessees, want construction of a \$200,000 hotel; Mrs. Bertha Johnson, owner.

Wash., Spokane—Plans for deaconess hospital have been completed and a campaign will be inaugurated to raise the \$75,000 needed.

Wash., Tacoma—Bids received about March 1, for construction of a 16-story hotel for the National Realty Co.; estimated cost, \$450,000; Heath & Gove, architects, National Realty building, city.

Wis., Delavan Lake—Marshall & Fox 38 S. Dearborn st., Chicago, are the architects for a 3-story \$100,000 hotel to be built here; owner's name withheld.

Wyo., Evanston—Wheelright Bros., Ogden, Utah, will raze the old Rocky Mountain hotel and in the spring will build a modern \$35,000 hotel.

CONTRACTS AWARDED.

B. C., Port Coquitlam—Contract for a 2-story hotel to be erected for Coquitlam Terminal Co. awarded to W. H. Mueller, Vancouver, estimated to cost \$50,000.

Iowa, Sioux City—Contract with the H. J. Ryan Electric Co. for wiring the new maternity hospital for the Florence Crittenton home.

Kan., Wichita—Contract for construction of hospital, 5-story and basement, awarded to John Denny, 1451 N. Lawrence st., city.

Mont., Geraldine—Contract has been let to E. C. Fuller for a 34-room hotel at Geraldine, a new town half way between Lewistown and Great Falls.

Wash., Everett—Contract has been awarded to Cardle Bros. Co. for a 5-story, concrete and steel hotel for Mrs. M. B. Brey, at about \$100,000.

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

Ida., Cottonwood—Excavation work has begun for the proposed building for the Knights of Columbus; foundation of concrete, elevation of frame, 2-story.

Iowa, Alton—The members of the Paullina band have purchased the opera house from Henry Proehl and will spend \$1,500 on repairs and needed improvements.

Iowa, Chariton—Work has begun for enlargement of the Grand theater.

Iowa, Council Bluffs—St. Albans lodge, K. of P. has purchased a site and will erect a handsome new building. Plans not yet drawn, but a 3-story building is contemplated.

Iowa, Des Moines—Architect N. T. Vorse, 911 S. & L. building, is receiving bids on terra cotta and steel for a motion picture theater; owner, A. H. Blank, care Fidelity Loan Co.; 44x132, 2-story, seating capacity 700.

Iowa, Des Moines—Shriners planning to build \$10,000 temple; definite action Dec. 26; J. J. Jones, recorder.

Iowa, Glenwood—The Glenwood military company is raising funds to build its own library.

Iowa, Oelwein—Plans for a moving picture theater for F. and F. C. Meves have been completed by J. T. Burkett, Waterloo, Iowa; 32x90, 1-story, frame, plastered; day work; steel sash, steam heat, piped for water, electric light, sheet metal cornice and ceiling composition roof, common, patent and ornamental plaster, Beaver board figured and art glass, leaded lights, birch finish, stucco exterior.

Iowa, Fairfield—Preliminary steps have been taken for building a home for the Masons; Clinton lodge, chapter and commandery have purchased a site for a building.

Iowa, Winterset—Preliminary plans are in progress by Wetherell & Gage, 202 Youngerman building, Des Moines, Iowa, for a Masonic Temple here; 50x120, 2-story and basement.

Minn., Montevideo—The Eagles contemplate building a modern 2 or 3-story hall, lodge on second floor.

Minn., New York Mills—Village hall totally destroyed by fire; address city clerk.

Minn., Princeton—Plans and specifications ready and contract virtually let for a moving picture theater by C. S. Neumann; 34x120, brick and concrete, fireproof, steam heated, to seat about 700; front of white enamel, sloping floors, boxes, cloak room, etc., cost \$8,000.

Mont., Livingston—A. W. Miles, chairman of the Elks' lodge, is taking bids on a 3-story brick store and club room; 50x140, steel beams and columns, ornamental iron firescape, granite and lime cut stone, pressed brick, electric lights, sheet metal cornice, skylights, galvanized sheet metal ceiling, wood sash and frames, composition roof, patent plaster, glass, tile floors, marble wainscoting, oak and maple floors, fir finish, one dumb

waiter; cost from \$40,000 to \$50,000; C. H. Turk, architect, Livingston, Mont.

Neb., Fremont—Commercial club and leading citizens behind a movement to build modern convention hall; E. R. Gurney, president Commercial club.

Neb., Fullerton—M. N. Bair, Hastings, Neb., drawing plans for Odd Fellows lodge building; 60x62 feet, 2-story, brick; cost \$9,000; Kasota stone, asbestos roofing, brick cornice, d. s. and plate glass, hard wall plaster, yellow pine flooring and interior finish.

Neb., Lincoln—Bids are being taken by J. H. Allen, secretary, 120 N. 12th st., city, for a dance hall and store room; 50x142, 2-story; Nebraska Material Co., owner; day work and sub-contracts.

Neb., Silver Creek—Bids for a hall and store building will be taken until Jan. 5, by Roth & Kula, owners, and Chas. F. Wurdeman, architect, Columbus, Neb.; 44x88, 2-story and basement; cost \$10,000.

Ore., Portland—Hurley-Mason Co., Tacoma, have contract for designing and constructing the new Broadway theater here to be leased to Thos. J. Noonan, Chicago.

Sask., Saskatoon—The Happilyland Amusement Co., Ltd., will take over the exposition grounds from the city and erect various amusement devices, pavilions, etc.; plans being prepared.

S. D., Watertown—The Eagles are looking for a site on which to build a lodge home, and plans are being laid to build as early next spring as possible.

Wash., Raymond—The Odd Fellows will build a handsome home; plans being prepared by Franklin Rodgers & Co.; 50x90, three stories, press brick front, cost \$10,000 to \$12,000.

Wash., Seattle—J. A. Creutzer, New York block, will prepare plans for moving picture theater for Geo. H. Stork.

Wis., Birchwood—Frank Spalenka, Stevens Point, Wis., has just been selected as the architect for a proposed village hall and opera house; bonds voted; Guy Van Doren, village clerk.

Wis., Bungalow—Plans are in progress by E. O. Blake, architect, 621 Davis st., Evanston, Ill., for a 1-story summer theater and hotel, 125x200; owner is the Bungalow Hotel & Development Co., 524-32 N. Clark st., Chicago; ready for bids about Jan. 5.

Wis., Green Bay—G. A. Vanustern, west side, has started work on a fireproof opera house and dance hall; 1-story, 16-foot ceiling, brick, beams of steel and cement and steel pillars will be placed in the center of floor to support ceiling; 100x46; steam heated and electric lighted; cost about \$6,000.

Wis., Milwaukee—Proposals for the proposed Milwaukee Athletic club will be received by a committee of which Julian Simon is chairman.

Wis., Stangelville—Plans are in progress for a dance hall, hotel and bar-room, 49x68, 2-story and basement; Foeller & Schober, architects, Green Bay, Wis.; owner is Joseph Konop, Stangelville; owner ready for bids about Jan. 15.

SCHOOLS

Notes Arranged Alphabetically by States.

Iowa, Adel—Contract let to Wagen, Krehr & Walter, Wathena, Kans., for a 2-story high school at \$42,000; Trunk & Gordon, architects, St. Joseph, Mo.

Iowa, Cedar Rapids—Ground was broken for the Coe college for new \$125,000 girls' dormitory; the \$50,000 Voorhees wing to be erected first; then the alumni hall to cost \$40,000.

Iowa, Forest City—Bids received until 8 p. m., Jan. 15, for erection of school house in township of Linden and county of Winnebago, P. E. Robinson, secretary.

Iowa, Grinnell—A women's quadrangle will be built at Grinnell college, to furnish accommodations for 150 women; plans are also being perfected for a men's union building, modern throughout.

Iowa, Lone Tree—A 2-story school and basement will be built, cost \$30,000, E. D. Carl, secretary of board of education, special election will be held Dec. 22.

Iowa, Rome—A 2-story school house will be erected here, cost \$12,000; architect, S. I. Heaps, 617 Iowa State Bank building, Burlington, Iowa, in abeyance until spring.

Iowa, Sioux City—The structural steel for the auditorium for the high school annex will be placed by Saturday night ready for work on walls and roof.

***Iowa, Tama**—Bids opened Dec. 20th on Tama school building were as follows for general contract: Hodgkin Construction Co., \$45,975; John Hunzinger, \$47,963; C. W. Ennis, \$47,986; Jas. Park, \$49,947; Hoar & Parkinson, \$50,500; J. E. Tusant & Son, \$51,385; Kucharo & Lewis, \$51,280; Guarantee Construction Co., \$51,473; C. E. Atkinson, \$52,559; C. W. Reimer & Co., \$52,611; John Leefers, \$54,400; C. M. Pennell, \$56,583; L. H. Hansen, \$56,773; B. Y. Construction Co., \$56,950; C. C. Norgard, \$58,770. Bids on plumbing and heat:

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E. G. Penrose, \$10,875; Mathey Plumbing Co., \$11,868; Schueth Bros., \$12,144; Ideal Heating & Construction Co., \$12,854; Interstate Heating Co., \$12,829; Messner & Co., \$13,025; appropriation for building, \$60,000; Chas. A. Dieman & Co., architects, Cedar Rapids, Iowa.

Kas., Ottawa—Work on Ottawa university's new gymnasium will be started next spring as soon as the weather permits, and it is probable that the cornerstone of the new building will be laid on Charter Day, April 21, according to Dr. S. E. Price. The tentative plans provide for a 3-story building constructed of brick with stone trimmings. The dimensions are to be 70x106 feet, the height to be approximately 30 feet. A swimming pool 20x40 feet, as basket ball court 50x70, a running track suspended from the ceiling, locker rooms and shower baths are provided for, the estimate cost being \$30,000. Later it is proposed that a campaign be begun to provide for at least three new buildings, including a science building, and library. A committee has been appointed by the trustees to conduct this campaign.

Minn., Crookston—A new heating plant will be installed in the school house in district No. 75, township of Russia.

Minn., Foley—No contract was let for the school building; bids being too high, William Stromberg being lowest bid at \$12,913, R. C. Buckley, architect, St. Cloud. Other bidders were; A. G. Wahl, St. Cloud, at \$13,560; Val Herman, Holdingford, at \$13,893; N. A. Heinman, St. Cloud, \$14,084; Ed. Hirt, St. Cloud, \$14,443; Carl Kropp, St. Cloud, \$14,792; Hodgins Construction Co., Sioux City, Iowa, \$14,500; E. M. Wahl, St. Cloud, \$15,230; F. A. Hancock, Morris, \$18,273.

Mont., Bozeman—Two bids were received for installation of heating plant in high school building, as follows: Yellowstone Heating & Plumbing Co., of Billings at \$1,570; H. J. Koozer, of this city at \$1,290; both bids rejected.

Mont., Missoula—Fire destroyed the Lincoln school building; total loss.

Mont., Ryegate—Contract for new school house on E. Bench in district No. 19 was not awarded; building and furnishings to cost about \$1,200.

Neb., Tobias—Plans in progress by architect, R. W. Grant, Beatrice, Neb., for a 2-story and basement school building; cost from \$15,000 to \$20,000. R. G. Drysdale, secretary board of education.

N. D., Fargo—An academy, 4-story and basement, 60x135, cost \$85,000; architect, G. P. Stauduhmar, 608 Best building, Rock Island, Ill., bids in, Sister M. Paprista in charge.

S. D., Elk Point—All bids rejected on the 2-story school house, 72x85, plans being revised, will take new bids soon; architect, G. W. Burkhead, Grain Exchange, Sioux City, Iowa.

Wis., DePere—Contract awarded to Geo. Biler of Algoma, for erection of a large school house at Monticello.

Wis., La Crosse—Opening of bids for the high school at Mauston, Wis., postponed until January 9, 1914; Parkinson & Dockendorff, architects.

Wis., Little Black—Plans are in progress for rebuilding of school house; 1-story, 12x28, G. A. Krasin, architect, Marshfield, Wis., cost \$1,500, F. F. Langteau, clerk, Medford, RFD. No. 2, owner will take bids Jan. 15.

Wis., Madison—Building committee of school was authorized to prepare specifications and plans for installation of a heating plant in the new high school.

MILLS AND FACTORIES

Notes Arranged Alphabetically by States.

Iowa, Bedford—James Salter, proprietor of the Missouri Granite Works will enlarge his plant.

Iowa, Cedar Falls—The Iowa Gate Co. will erect a factory here; J. B. Clay, manager.

Iowa, Cedar Rapids—A new factory will be erected here by the Cedar Rapids Excelsior Works, John J. Meaney, superintendent.

Iowa, Davenport—A factory and warehouse will be erected by the Halligan Candy Co., 402 E. 4th st.; architect A. H. Ebeling, 301 Security Bank building; will mature in spring.

Iowa, Grandview—The property of the Grand View Lumber Co., the button factory was burned; J. I. Berk, owner.

Iowa, Ottowa—Plans are being made to convert the brewery into a manufacturing plant.

Iowa, Ringstead—The cement block and tile factory which burned here last August will be rebuilt.

Iowa, Sioux City—Merritt Smith is building a planing mill at Leeds, 48x48; cost \$4,000.

Iowa, Williams—The \$100,000 factory for the new telephone meter company will be erected in Ft. Dodge instead of Webster City.

Mich., East Jordan—The saw mill of E. Jordan Lumber Co. burned; loss about \$200,000.

Minn., Eveleth—Work is being rushed on the new pumping plant Lawrence & McCann, contractors of this city.

Minn., Pine River—Buttermaker Lauritzen is remodeling creamery building.

Minn., Spooner—A new creamery is being built here.

Minn., St. Cloud—A site has been purchased and a creamery will be erected in spring by the Sauk Valley Creamery Co.

Minn., Thief River Falls—The Thief River Falls Iron Works organized for the purpose of doing a general foundry business.

Mo., Kansas City—Williams Bros. will erect a 2-story factory, 50x112; cost \$10,000; architects J. Geo. Braecklein, Massachusetts building; Williams Bros., care of W. Z. Flannery, 902 Commerce building, taking figures.

Mont., Billings—A \$30,000 canning factory will be erected at Cove.

Mont., Helena—Frank J. Glenn, formerly Sioux City, Iowa, will erect mill here, Mr. Glenn is president of the Gold Mining & Milling Co.

Neb., Omaha—A 6th story will be added to the Omaha Cold Storage plant. John Harte, contractor and Fisher & Lawrie, architects. Plans are being made for the new People's Ice & Cold Storage plant by the company's architect at Chicago, and will be ready before the first of the year.

Neb., Omaha—The Armour Co. will build a new hog killing plant 65x150, 5-story, cost \$30,000; steel, concrete and brick construction.

Neb., Wausa—Hanford Produce Co. will erect a cement block cream station.

N. D., Drake—H. O. Melland of Morris, Minn., contemplates building a flour mill here.

N. D., Hebron—Plans are being made for rebuilding the state lignite experimental briquetting plant recently burned; Dean E. Babcock, manager.

N. D., Lansford—Business men will have an acetylene gas plant installed for illuminating and heating gas.

N. D., Mandan—A movement has been started here to build a creamery.

S. D., Belvidere—The Belvidere Co-operative Creamery Co. will build an ice storage house.

Wash., Bellingham—The Nitro Development Co. have asked for permits to build three hydro-chemical plants on the upper Skagit for the purpose of extracting nitrogen from the air for fertilizer, one to be built at Sauk, water power will be obtained from Suiattle river for this one, the second will be located at mouth of Buck river and the other on Downey creek. Agents for new development company are Stone & Webster, and all preliminary surveys have been completed by their engineer, B. Thomas, Seattle.

Wash., Bellingham—Largest Lumber Mill in the world will be built on the Milwaukee tracks.

Wis., Abbotsford—The Curtis Produce Co. is building a new cheese factory two miles west of Curtis.

Wis., Chippewa Falls—The saw mill at Ruby owned by Edward L. Hawn damaged by fire; loss about \$20,000.

Wis., Green Bay—Smith & Murphy of this city who recently lost the plans of the Great Northern Pail Co., by fire, will rebuild at Gilbert; fire did damage of about \$17,000; covered by insurance.

Wis., Green Bay—The Akem Laundry Co. will build a large addition to their plant.

Wis., La Crosse—The Sterling Machinery Co., of La Crosse, will build a factory at LaCrescent, Minn., capital \$25,000; Ernest Weige, president, A. Hynne, secretary.

Wis., Madison—It is reported that U. S. Sugar Co. will build a refinery here.

Wis., Marinette—The city council issued permit for erection of a plant by the Marinette Packing Co.

Wis., Monroe—Borden Condensing Milk Co. will erect a plant here in spring; cost \$2,500.

Wis., Oshkosh—A 3-story factory building will be erected by the Diamond Match Co., 158 N. Market st., Chicago; plans in progress; engineers, Lockwood, Green & Co., 238 Dearborn st., Chicago, Ill. Engineers taking bids on concrete and piling, foundation; superstructure later.

CONTRACTS AWARDED.

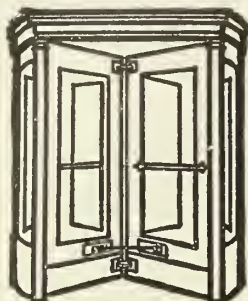
Iowa, Davenport—A chemical building will be erected by Davenport Water Co., R. Henderson, manager; 114 W. 3d st.; foundation in; general contract let to McCarthy Impr. Co., 214 W. 4th st.; architects, Claussen & Claussen, 314 Central office building; 30x60; cost \$9,000.

Mich., Detroit—General contract let to Culbertson & Kelly, 814 Ford building, Detroit, for building addition to Bonash mill; 1-story, 60x160, private plans; owner Michigan Carbon Co., Delray; work started.

Neb., Columbus—A 1-story factory building will be erected by Gerrad estate; general contract let to Parker Bros. Construction Co.; 22x70; cost \$2,500; private plans.

Wis., Oconomowoc—The Nelson Weber Co. have contract to build cold storage plant at the Binzel Brewery.

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GARAGES AND BARNs

Notes Arranged Alphabetically by States.

Iowa, Shenandoah—Brick work has been delayed on the new Piper garage.

Iowa, Sioux City—Fire destroyed the two big barns of the Held Bros.; loss estimated at \$100,000.

Iowa, Sioux City—James Weir is building a new garage in Leeds, 40x50.

Iowa, Swea City—A 1-story, 44x60 garage will be erected by Pearsons Auto Co., cost \$5,000; architect J. O'Connor, 1115 Fleming building, Des Moines, Iowa; owner taking bids.

Iowa, Wapello—Fire destroyed the barn of Jesse Lambert; loss about \$1,500.

Iowa, Washington—A large garage is being erected by Jesse Phillips, another is being built on the line of the Great White Way, by Smith & Gibson.

Iowa, Wellman—A 2-story garage will be built by Schroder Bros., Wellman. Plans in progress, 60x100, architect, O. H. Carpenter, 4-6 Phoenix building, Iowa City, Iowa.

Iowa, West Union—Davis & Upton will erect an up-to-date garage in spring.

Mich., Detroit—Wm. Dillon will erect a garage, 21x21, architect, Geo. V. Pottle, 708 Detroit Gas Co.'s building; architect is taking bids to close at once.

Minn., Breckenridge—A large stock barn on C. R. Lillig-ridge farm burned; loss about \$2,500.

Minn., Cambridge—Contract for building the barn for the M. W. A., 26x46, was awarded to Elmer Bjorklund and John Stone.

Minn., Doran—A modern garage, 40x60 is being erected by Fred Widman.

Minn., Friberg—August Buckholz has foundation in for new barn of Martin Anderson.

Mont., Butte—Barn of the North Butte Mining Co. was burned.

Neb., Ainsworth—R. E. Syfert is rebuilding garage recently burned, new garage will be 20 feet longer than old one which cost \$20,000.

N. D., Englevale—Fire destroyed the large barn of Fred Goodfellow; loss about \$3,000.

N. D., Fargo—W. M. Ball, local agent for the Kissel Kar, will build the largest garage in the Northwest, 300x63, 2-story, modern, plans not out yet; bids taken in January or February.

Neb., Gordon—E. Havener & Carl Sasse will build a large garage, 50x100 feet, brick construction.

N. D., Langdon—New 50x50, garage is nearing completion, for Sparling Bros.

S. D., Beresford—H. J. Meidell will build a garage, architect, W. L. Steele, U. Bank building, postponed indefinitely.

S. D., Brookings—Ground was broken for the new Bunday garage, 100x60, brick construction.

S. D., Flandreau—Permit was granted to Bailey Bros. for erection of a garage.

Wis., Antigo—The barn on the Tinney farm was burned; loss \$2,000.

Wis., Chilton—Michael Gerhard of Brandt will build an addition to his barn, 42x72.

Wis., Darlington—Work has started on the reinforced concrete garage, 40x100, for Helm Bros., fireproof, steam heated, toilets, rest rooms, offices, etc.

Wis., Fond du Lac—Fire destroyed large barn of Oscar Peebles; loss about \$3,000.

Wis., Milwaukee—A number of Aldermen are discussing proposition of erection of a municipal garage.

Wis., Milwaukee—A 1-story garage and undertakers' morgue will be erected, owner's name withheld; 45x65, architects, Siebert & Bruecker, 557 12th st. plans in progress.

Wis., Milwaukee—A 1-story garage, 110x150 will be erected by Joseph Schlitz Brewing Co., 3d and Galena sts.; plans completed, Architect Edward Kozick, 406 Alhambra building.

CONTRACTS AWARDED.

Minn., Grasston—Algot Staudlund is building a new barn.
Minn., Sandstone—Hans Jepsen has commenced erection of a new barn.

S. D., Foley—A new garage is being erected by W. F. Uthe.

Wash., Tacoma—Contract was let this week for a \$20,000 garage to be erected by M. H. V. Co., Dr. M. J. McNeithney, president; concrete and brick construction, 3-story, modern throughout; S. C. Irwin, architect.

Wis., Green Bay—John Holberg, 627 S. VanBuren st., will build a 1-story garage, 24x30; cost \$1,100; general contract let to Forbry Construction Co., Minahan building, architects, Anderson & Williams, Wilner building.

CHURCHES

Notes Arranged Alphabetically by States.

Iowa, Marshalltown—Another new church will be erected here by the Elim Norwegian Lutheran association; also parsonage for pastor, Rev. O. Ingvaldstad.

Iowa, Sioux Center—The new church organization of Sioux City calling themselves, the Old Reformed are planning on building a new church.

Iowa, Sioux City—Lithuanian Catholics are raising funds to build a new church.

Iowa, Winthrop—Work commenced last week on the new Congregational church.

Minn., Byron—Nevin Pollock, Jr. was in the city consulting with Rev. E. C. Hickman on plans for alterations for remodeling the Byron church.

Minn., Gentilly—A new Catholic church is planned for the spring; cost from \$20,000 to \$25,000 to be of Menomonie brick, Father Thielion, pastor.

Minn., Mapleton—The Christian Denomination will build a \$10,000 church at Fairmont; modern throughout.

Neb., Omaha—The First Presbyterian Church association will erect a new building next spring. Cost about \$100,000; plans being prepared by architects.

Neb., Omaha—Members of the Dunkards church are planning to build a large edifice next year.

Neb., Omaha—A 1 and 2-story church will be erected here by the Lutherans, 114x97, combination brick church and parsonage; contract let to Geo. Rahn, contractor at \$32,000.

Neb., Potter—Bids received for the new M. E. church; Jan. 2, 2 p. m., C. W. Johnson, Grant Brady and Fred Nelson, committee.

S. D., Deadwood—A new church is being erected on site of old M. E. church.

Wash., Republic—A 1-story and basement church will be erected by the Presbyterian Church association, 56x56; cost \$10,000, architect, A. W. Woods, 109 S. 10th st., Lincoln, Neb., plans to be finished about Jan. 2, native stone, structural iron, wood shingle; address owner.

Wis., Eau Claire—The Grace English church will erect a new edifice here. Cost \$35,000; Rev. H. M. Thompson, pastor.

Wis., Loyal—A church will be erected by the Lutheran Congregational association; cost \$10,000, 40x76; bids received about Jan. 15. Rev. E. Kemena, pastor, architect, G. A. Krassen, Marshallfield, Iowa.

Wyo., Casper—The Casper Presbyterian Church have purchased a site and will erect a modern church.

CONTRACTS AWARDED.

Minn., Duluth—Contract let to Diebel Bros. for remodeling of the Holy Apostles' Episcopal church, all modern improvements; cost \$2,500; Rev. Mr. Clarke, J. Allyn Scott, committee.

Minn., St. Peter—Chas. H. Feldman has contract for making extensive repairs to the heating plant in the Presbyterian church at Kasota.

Mont., Three Forks—Contract let to K. P. Conklin, architect, L. B. Volk, Los Angeles, Cal., for erection of Presbyterian church; cement and brick construction.

Neb., Ruskin—Contract let to Julius Nelson for erection of new German Lutheran church.

BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Iowa, Chariton—Three bids were received for the erection of the Brown building, as follows: Teas Bros., at \$11,100; D.

Iowa, Council Bluffs—Wickam Bros. have contract to erect a building for Leonard Everett, 1-story brick, concrete floors and wooden, 5-section front.

Iowa, Council Bluffs—O. H. Brown's drug store damaged by fire.

Iowa, Dubuque—The Telegraph-Herald has closed deal for purchase of the late Dr. Geo. Allen Staples' estate, and will remodel same into a business building.

Iowa, Elk Horn—The store building of Rorbeck burned.

Iowa, Fort Dodge—Work has begun on the 3-story block under construction by G. W. Mason.

Iowa, Muscatine—Storage house in progress of construction; it is probable that a large storage house will be erected by Roach & Musser, Sash & Door Co. in spring.

Iowa, Onawa—Improvements are being made on the Mitchell and Johnson building.

Iowa, Ottumwa—Curren's ice house was burned, loss \$15,550.

Iowa, Pocahontas—Owen & Montgomery do not expect to commence erection of their machine shop until spring.

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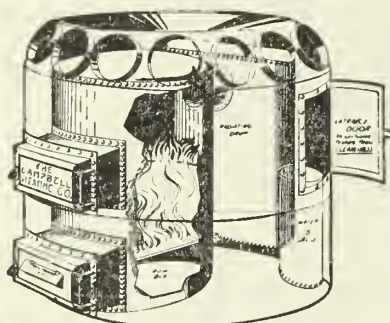
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Iowa, Shenandoah—Earl Sheets has secured plans for remodeling the building occupied by Jackson drug store.

Iowa, Spencer—The Maurer Bros. Co. are putting in foundation for a new garage and machine shop; 56x94, cement block and 1-story.

Iowa, Wiota—J. F. Engle & Son will erect garage, soon as weather permits; cost \$3,000.

Minn., Albert Lea—Fire destroyed the grocery and general store of Ray Donahue, loss about \$1,500, at Twin Lakes, Minn.

Minn., Big Fork—Pris Peloquin is building a pool hall.

Minn., Brainerd—Commercial club members have become interested in organizing a Farmers Produce Co. and a warehouse will be erected.

Minn., Chisholm—Fire broke out in the Bozich & Chrep building, doing \$8,000 damage.

Minn., Chisholm—John Hulme is building a 2-story modern building.

Minn., Dennison—Ole Thoreson is building a work shop, 22x60, of corrugated steel.

Minn., Duluth—Morgan L. Davis of Chicago, is conferring with his agents, F. I. Salter Co. for erection of a building at 1st av. and Superior st. A modern 2-story building will be erected at 27 W. Superior st. by Jos. E. Davies.

Minn., Elbow Lake—Hanson Bros. are erecting a handsome new brick block, solid brick, 32x80, 2-story, full basement, pressed brick front plate glass windows, modern throughout.

Minn., Graham—Work has started on new blacksmith shop for H. H. Johnson.

Minn., Hibbing—Bids received Dec. 29, at 8 p. m., for the erection of a warehouse in town of Stuntz; check for 10 per cent; Victor J. Benoe, town clerk, town of Stuntz, Hibbing, Minn.

Minn., Lester Prairie—Wiese & Kuhlman will build a large brick building.

*Minn., Long Prairie—Bids received by John J. Reichert, cashier, until 2:30 p. m., Jan. 12, for building and erection of fixtures and remodeling of banking room; check for \$200. Officially advertised in this issue of the Improvement Bulletin.

Minn., Mankato—The D. W. Radichels cement, tile and culvert works were destroyed by fire; loss about \$8,000; insured; will be rebuilt.

Minn., Middle River—B. F. Benson of Cottonwood may replace his burned building here with a brick.

Minn., Minnesota City—C. C. Smith is erecting an addition to his store.

Minn., New Ulm—F. H. Retzlaff will erect a large storage building for a machinery and garage shop.

Minn., Olivia—The general merchandise stock belonging to Peter Voge was burned.

Minn., Renville—A. A. Doer is making extensive improvements in his place of business, installing heating plant and electric lights.

Minn., Sacred Heart—Fire destroyed the store of Peter Voge.

Minn., St. Paul—The Raymer Hardware Co., 373 Robert st. will remodel the Peterson block, 56-62 E. 5th st. and remove as a result of demands of increasing business; cost about \$15,000.

Minn., St. Paul—P. N. Peterson Granite Co. announces that the company will erect a large new plant in 1914, probably in Midway district.

Minn., Winona—Gus Priewert will build a 1-story brick news stand.

Mont., Butte—Fire destroyed the First State Bank block causing damage of \$130,000; W. G. Conrad, owner.

Mont., Butte—Fire destroyed the dry house of the Speculator Mining Co., loss about \$6,000.

Mont., Dixon—W. E. Campbell has plans and specifications prepared for his new hardware store building, and is receiving bids from contractors, new building is 70 feet long by 48 feet wide; basement, 2-story; cost \$3,000.

Mont., Great Falls—R. S. Ford has notified tenants in his building to vacate by Feb. 1, and the building will be razed to make room for a 5-story modern business block.

Mont., Helena—Sands Bros. Dry Goods Co. will erect a modern 2-story building in the near future; electric elevators.

Mont., Livingston—Business block occupied by following firms was burned: A. W. Miles Hardware Co., loss \$40,000, Dan Smith's saloon, loss \$4,500; Miss Hattie Murphy rooming house, loss \$4,000; M. J. Walsh Co., loss \$1,000; Wm. Hruza, loss \$5,000; Fred Koehler, jewelry store, loss \$500; C. M. Harvey, attorney, loss \$1,000; First State Bank. A modern 3-story fireproof block will replace it.

Mont., Livingston—Plans will be prepared for rebuilding of the First State Bank.

Mont., Livingston—Fire destroyed the Miles business block owned by W. G. Conrad, of Great Falls, loss \$140,000.

Mont., Ulm—A stock Co., J. E. Largent president, will erect a 2-story concrete block, first story to be used for store pur-

poses and the second for hotel. Basement will be dug this winter and contract let early in spring for completion of building before June 1.

Mont., Plevna—Excavation has begun for the new Borgering State Bank building, Plevna; J. Borgering, president, Melrose, Minn; Peter Jacobson, contractor.

Mont., Roundup—Fire totally destroyed the clothing store of Eli Kukoly, loss \$2,000.

Mont., Simms—Cawthra & Moore have purchased site and will erect a modern business building soon.

Neb., Dixon—Jake Welsh will erect a saloon building.

Neb., Gering—G. E. Swan will erect a modern store building.

Neb., Norfolk—Foundation has been completed for Williams' bakery. Excavations have been started for Will Raasch's store; Martin Sporn is considering erecting a new block.

Neb., Wood River—J. R. Jewett will erect a brick building.

N. D., Fargo—A 1-story frame warehouse will be erected by Northern School Supply Co., 50x100. Bids taken by the Northern School Supply Co., close Dec. 23, Sam Crabbe, architect, Fargo, N. D.

N. D., Hazen—M. Frank is excavating for his general store building, 30x60, contract not let yet.

N. D., Minot—A \$25,000 cold storage plant will be built here this winter by the Northwestern Cold Storage Co.

S. D., Sturgis—Fire destroyed the store building, known as Winter Store.

S. D., Vermillion—R. E. Stinton is making many modern improvements in store building.

S. D., Vienna—Seven store buildings were destroyed by fire; loss about \$70,000.

Wash., Tacoma—Plans for two 30,000-barrel oil tanks for the Standard Oil Co., were filed with Building Inspector W. Scott Snyder, cost about \$10,000.

Wis., Eau Claire—Excavation has begun for basement of J. Meyer's store in suburb of Allen.

Wis., Eau Claire—Kepler Co. will remodel and enlarge store. ing will be erected here.

Wis., Eau Claire—A 26x70, addition is being built to the Red Front store by contractors, Hoeppner-Bartlett; Peter Peterson, is building a 23x30, pressed brick front tailor shop.

Wis., Fond du Lac—A third story will be built to the Northern Casket Co.'s building. S. S. Krellge Co. will remodel their block.

Wis., Madison—Work has been started on foundation of the 8-story skyscraper, by Gay & Chapman, for store and office building, will probably cost \$100,000.

Wis., Madison—The Madison Gas Engine Co.'s warehouse was burned; loss about \$750,000.

Wis., Madison—A. F. Menges will build a 3-story business block.

Wis., Neillsville—W. E. Bennett, architect, La Crosse, Wis., has prepared plans for remodeling of the bank building; bids taken by owner, Neillsville Bank, until Jan. 15, 1914. Ornamental iron, common pressed brick, hot water heat, electric lights, two ventilators, patent ornamental plaster, metal lath, corner beading, paint, varnish, plate glass, sidewalk lights, marble interior maple and marble floors, walnut finish.

CONTRACTS AWARDED.

Iowa, Alton—Fire destroyed the Ideal Bakery, loss total.

Iowa, Burlington—Contract for the New Iowa Biscuit Co. was let to John Thy of Sunnyside av. Architect Geo. H. Washburn, of Burlington and H. E. Ratcliffe, Keokuk, will be associated with him in work; 5-story, above basement, 54x118, tapestry brick front, two ooen plant, work to start at once.

Iowa, Dubuque—A new bank building is being erected. H. G. Wiley, contractor; contract for bank front let to Geo. Schulte; cost about \$30,000.

Minn., Perham—Amos Marckel has begun work on construction of an implement shed, 60x300, brick walls and metal roof, cement floors. Alex Nelson, contractor.

Minn., Rochester—G. Schwartz awarded contract for R. C. Drips' grocery store; cost \$15,000 to be completed April 1.

Minn., West Concord—A store and postoffice building will be erected by C. L. Grover, 2-story, 24x76, brick and tile construction; cost \$4,000; wire cut shale brick, prepared roofing, brick cornice, plate and d. s. glass, hard plaster, vacuum vapor steam heat, hard maple floors, yellow pine finish, boilers, cementing, fireproofing, gas fixtures, hollow tile, iron beams, metal ceiling, metal and wire lath, plumbing, screens, skylights, storm sash; plans are being made; built by architect, C. L. Grover, Zumbrota.

S. D., Flandreau—Davidson Bros. & Rae have contract for laying foundation for the Bailey garage and have commenced work.

N. D., Hazen—Contractor Chas. Westling and crew will build a lumber shed for the Mandan Mercantile Co.

Wis., Sheboygan—Contract let to Chris Zelle & Son for erection of large addition to Herman & Schult's building.

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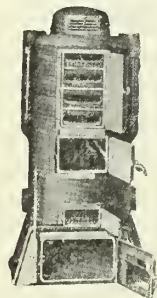
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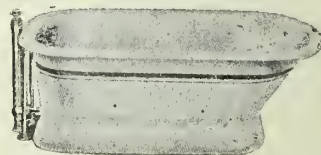
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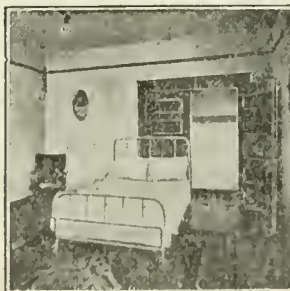
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ELEVATORS

Notes Arranged Alphabetically by States.

Iowa, Lanyon—Farmers Elevator Co. will make repairs to their elevator; architects and builders, Younglove Construction Co., 2d floor Grain Exchange, Sioux City, Iowa; work in progress.

Iowa, Mooreland—Farmers Elevator Co. making repairs to its elevator, Younglove Construction Co., architects and builders, 2d floor Grain Exchange, Sioux City, Iowa.

Iowa, Roelyn—A 20,000-bushel grain elevator will be erected by H. Thornson, Roelyn; plans completed by architects and builders; Younglove Construction Co., 2d floor Grain Exchange building, Sioux City, Iowa.

Iowa, Sioux City—The Younglove Construction Co. have furnished plans for a \$5,000 grain elevator, to be erected at Roslyn, Iowa.

Minn., Duluth—Fire destroyed the Andrews Elevator.

Minn., Princeton—Louis Peterson will erect a potato warehouse here.

Neb., Omaha—The Omaha Elevator Co. is building a new approach to the elevator.

N. D., Golden Valley—Farmers' Elevator Co. will build an elevator here; frame, 37x32, Meineche Building Co., architects, Marmarth, N. D. Bids close Dec. 27, 1913.

N. D., Lanona—Farmers in this vicinity are circulating a petition for shares to build a farmers' elevator.

N. D., Sheldon—The elevator of the Andrews Grain Co. at Elliot was burned.

S. D., Yale—V. L. Burge is building an elevator here.

Wis., Kaukauna—The Farmers Elevator Co. let contract for erection of an elevator.

RAILROADS

Notes Arranged Alphabetically by States.

Iowa, Keokuk—Work on Belt Line railroad to connect with Inter-City Bridge railroads and industrial tract will probably start in spring; ordinance for right to build in hands of city attorney, T. A. Craig.

Iowa, Muscatine—Reconstruction after fire which destroyed roundhouse and store Muscatine N. & S. road will begin at once, material ordered.

Iowa, Sioux City—This city is after the \$500,000 improvements including shops of the Milwaukee road; first considered as probability to be located at Dubuque.

Minn., Argyle—G. N. engineer has staked out site for new station.

Minn., Breckenridge—Great Northern will make extensive improvements in spring, to their property.

Minn., Roseau—Several towns have decided to vote bonds for new road through Roseau county from Canadian border south, bonds to be delivered only when road is finished, line to extend to Minneapolis and St. Paul.

Mont., Billings—N. P. has notified Chamber of Commerce that branch line will be built from Bridger to Bear Creek, and make unnecessary the proposed electric line.

Mont., Dillon—Butte to Boise railroad regarded here as practically assured, on advice from Phillip W. Blake, secretary, Chamber of Commerce, Butte.

Neb., Beatrice—Kilpatrick Bros., of Beatrice, have been awarded the contract for building the branch line of the Burlington road from Guernsey, Wyoming, to Wendover. This will connect the line from Billings down the Big Horn valley with the Guernsey road down the Platte river. The cost will be in the neighborhood of \$2,000,000. The line will be only nine miles in length, but it runs through the mountains and there will be three tunnels required. Work commenced.

Neb., David City—Commercial club has started campaign for extensive improvements in Burlington station, making it modern.

N. D., Beulah—Railroad company will build a large concrete dam across the Knife river, south of here, 30 feet high, back water two miles, bridge necessary.

N. D., Garreson—Great Northern instead of running line along river will cross Soo here, west through Rose Glen section to extension from McKenzie county at the river, this will place Garreson on the line.

N. D., Maxpass—Great Northern roundhouse was burned, new structure to be built.

Ont., Toronto—\$7,500,000 was secured in London by Sir Wm. McKenzie for construction of 1914 Canadian Northern; main line Quebec to Vancouver will probably be connected up during the year.

Wis., Belle Plaine—New station ordered at this point and Allensville.

MISCELLANEOUS

Notes Arranged Alphabetically by States.

Ill., Gilchrist—A colony of green houses is to be erected on the Edwards river near Gilchrist, Ill., by various Tri-City florists. The first step along this line was taken when Paulson Bros. of Rock Island announced their intention of building two green houses at that point to involve an expenditure of approximately \$10,000. Plans and specifications are being drawn.

Wis., Appleton—The government has an engineer and two assistants securing data along the Wolf river between Shiection and New London to further intelligent legislation to prevent a recurrence of the flood of a year ago last spring; they are taking levels, establishing bench marks and placing gauges along the banks.

Iowa, Cedar Rapids—Proposition to build a concrete dam across Cedar river to cost \$125,000 was favored by the voters by a large majority; Hedrich & Cochrane, engineers, Kansas City, Mo., will prepare plans.

Wis., Manitowoc—Contract for a 2d large steel tug to be built at the yard of the Manitowoc Shipbuilding & Dry Dock Co. this winter has been received by the company from the Hausler Co. of Milwaukee.

Alta., Calgary—A motor generator, and exciter attached, to cost \$18,250, to be bought from Kilmer, Pullen & Burnham, Ltd. of Toronto, was recommended by Commissioner Graves to the city council.

Minn., St. Paul—Bids received by Charles W. Copley, secretary board of police, until noon, Dec. 30, for one 30 h. p. run-about automobile with platform at rear; check for 10 per cent.

Mont., Missoula—Bids received by C. F. Von dem Bussche, 14th Inf. A. Q. M., until 10 a. m., Jan. 12, for the erection of a 10-foot iron flag staff at Missoula.

Minn., New Ulm—H. N. Somsen, city attorney, says city has no authority to build a municipal slaughtering house.

Neb., Lincoln—A petition is out for a city incinerator to cost \$30,000; address city clerk.

Alta., Calgary—Wm. R. Perrin is the architect for the new \$125,000 abattoir.

NEW FIRMS INCORPORATED

Notes Arranged Alphabetically by States.

Iowa, Des Moines—Hubbell Building Co., capital \$210,000; F. C. Hubbell, president.

Minn., Kerkhoven—Roller Mills Co., H. C. Rustad and others; \$25,000.

Iowa, Obebolt—The Co-operative Co., capital \$25,000; J. A. Cranston, T. W. Down and others.

Iowa, Waterloo—Headford Bros. & Hitchins Foundry Co., capital \$75,000; E. H. Headford, president.

Iowa, Waterloo—Architectural plans for the new ward building in McWilliams-Howley addition were submitted to the board last week by Mortimer B. Cleveland; to cost about \$35,000; brick, fireproof construction.

Minn., Duluth—Ulaewas Mining Co., P. S. Annaka and others.

Minn., Minneapolis—The Mackey Co., capital \$2,000,000; Frank J. Mackay and others.

RESIDENCES

Notes Arranged Alphabetically by States.

Iowa, Algona—Dutton & Sorenson are building a residence.

Iowa, Clear Lake—A. W. Wood is building a modern residence.

Iowa, Ellsworth—Claus Hanson and force are building a modern residence for J. O. Ringstad.

Iowa, Ellsworth—K. Fjetland and force have nearly completed basement of foundation for N. J. Nelson's new house.

Iowa, Keswick—Ray Irwin is planning to build a modern house in spring.

Iowa, LeMars—Henry Beaulieu is building a modern residence.

Iowa, Mareno—Fire destroyed the residence of Thomas McGovern.

Iowa, North McGregor—Fire destroyed the home of Herbert Willard; loss estimated at \$1,500.

Iowa, Red Oak—A modern 8-room residence is being erected by Victor Johnson.



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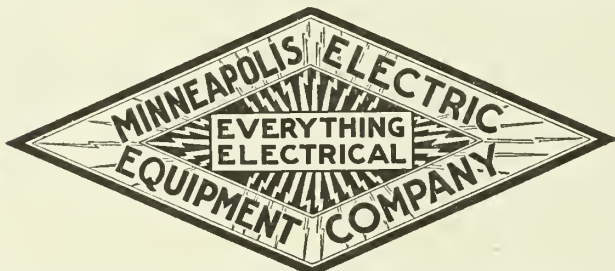
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DES MOINES, IOWA

Iowa, Cedar Rapids—Chris Hansen will build a new modern residence.

Iowa, Leon—Mrs. Willis Cornett will erect a modern residence soon. C. P. Barrickman, builder.

Iowa, Maquoketa—Fire destroyed the home of Mr. Sam Probst.

Iowa, Montezuma—H. F. Carl has completed arrangements for erection of a large modern residence.

Iowa, Sexton—Mr. Dutton is building a new house.

Iowa, Waverly—A new cottage is being erected at the Orphans' home for faculty members.

Minn., Alexandria—Mrs. H. J. Boyd will erect a modern house in spring.

Minn., Breckenridge—Jacob Redlinger is erecting a new cottage.

Minn., Elbow Lake—John Berger will build a dwelling soon.

Minn., Elbow Lake—Walter Fox will build a 26x34 bungalow.

Minn., Glenville—N. D. Gleason will build a modern house in spring.

Minn., Milroy—Henry Johnson is building a residence.

Minn., New Ulm—Henry Held is building a new residence.

Minn., North Branch—Chas. Olson is building a new dwelling.

Minn., Princeton—Wm. Swearinger will build a house.

Minn., Sleepy Eye—Ed. Honi will build a dwelling in New Ulm.

Minn., Verndale—W. A. Smith is building a modern residence.

Minn., Wabasha—A modern house will be erected by W. W. Dennels.

Mont., Anaconda—John Wenger will build an apartment house.

Mont., Anaconda—J. Y. Kemp will build a modern bungalow.

Mont., Great Falls—Permits were granted to Linnie Anderson for a 1-story frame bungalow, at 524 and 26 1st av. SW.; cost \$2,200; A. Satal, 1-story frame dwelling, 3rd av. SE., at 813, \$2,500; Grover & Leucharsm, 1-story frame shop at 1108 and 1110 1st av. S., cost \$1,200; The Aultman-Taylor Co., 1-story brick warehouse on G. N. railroad land; cost \$5,000; Gilbert Ely, 1-story frame dwelling at 1409 7th av. N.; cost \$2,400.

Mont., Miles City—Plans are under way for a new apartment house at Ekalaka.

Mont., Roundup—Elmer Scheffsick is building a 4-room bungalow for L. L. McGiboney.

Neb., Ashland—Carpenters have begun work on residence for Mrs. P. Jacobs. Wynot—Excavation has begun on residence for Henry Smith. Tecumseh—Charles W. Poole will build a large modern residence, concrete construction. Stuart—Mr. Botts is building a dwelling. New Castle—Charles Harrison is building a modern dwelling. Randolph—L. C. Kimball is rebuilding his residence. Hastings—W. M. Short is building a modern dwelling. Hastings—Mr. Murphy is building.

Neb., Aurora—C. W. Lakin is building a modern bungalow. Bladen—Geo. Ross has begun erection of a concrete block house. Emerson—John Hietzman has foundation in for residence. Fairmont—W. W. Prescott is preparing plans for an 8-room bungalow for Dr. J. M. Carr. Kearney—Lou Hayward is building a bungalow; W. E. Crossley has work in charge. Lincoln—Permit issued to Bert C. Danley for a \$2,500 dwelling. Hartington, (Logan item)—Fred Algor is building a residence. North Platte—F. F. Briggs from Sutherland plans to build a modern bungalow. N. Platte—Excavation has begun on residence for Mrs. Mary E. Watts. Omaha—Permits were issued to C. Noss, for a dwelling; cost \$1,000. J. P. Phippen, dwelling, cost \$2,500. Ernest E. Swanson, dwelling, cost \$1,500. Laura Allis Maxfield, cottage, cost \$1,500. Ed. Johnstone, dwelling, cost \$4,000. A. D. Wheeler, dwelling, cost \$1,800.

Neb., Aurora—C. A. Lakin of Aurora Brick Co. has commenced erection of a brick residence, 28x40, bungalow style.

Neb., Hartington—(Bow Valley)—Henry Stevens will build a modern residence in spring.

Neb., Hersey—Chris Kook, plans to build a new residence, John Tillion will build a new house this winter.

Neb., Palmyra—M. T. Ramsey is contemplating erecting a dwelling.

N. D., New Rockford—The Blaha-West Construction Co. are erecting two large modern residences.

S. D., Sisseton—Contract has been let for erection of a rooming house by E. C. Friedrich, 22x58, to be brick veneered in spring and second story added.

S. D., Vermillion—Ben Folvik will build a dwelling in the spring.

Wis., Barron—Geo. Darrah will build a residence.

Wis., Barneveld—R. L. Kendrick and crew are building a modern residence for Gottfried Schaller.

Wis., Brillion—L. A. Wordell will soon build a new residence.

Wis., Madison—Thomas Royston has applied for permit to erect a 3-story flat building; cost \$9,500.

Wis., Oakdale—Harry Lowery will build a modern residence soon; Carmichael Bros. have contract.

RAILROADS

Notes Arranged Alphabetically by States.

Minn., Cuyuna—Contractors N. P. railway getting material ready to build into Cuyuna.

Minn., Duluth—Plans completed in public works office for subway and approaches, Highland av. by Duluth, Missabe & Northern Railway Co.

Neb., North Platte—City will apply for a new station to state authorities.

Mont., Townsend—Citizens petitioned N. P. for a new station.

Minn., Albert Lea—Final survey for new M. & St. L. made this week, plans completed; work to start early in spring.

Minn., Crosby—Soo will start interurban service between Range towns, headquarters here; gasoline motor cars.

Iowa, Muscatine—Fire damaged Muscatine North & South railroad round-house, \$20,000; new structure will be built at once.

Minn., Two Harbors—Contract for Iron Range road steel coal dock awarded to Staack & McGary.

Minn., Two Harbors—Iron Range will rebuild hoisting part of docks; wooden trestle and incline, to be replaced with steel, concrete foundation docks 1 and 2.

Wis., Ashland—Numerous improvements in ore docks are planned by Soo road; new dock will be built 1914, and probably another steel and cement in 1915; new roundhouse.

Wis., Fond du Lac—Plans by Harry Immel are under consideration by state board of control for new station; contractors preparing to bid. New steel cage, new plumbing and other remodeling old station.

Wis., Merrill—Location of station Minneapolis, Marinette & Merrill road discussed; chief engineer E. S. Burnette and A. Burdall, assistant, rushing plans for road construction.

Wis., Port Wing—T. N. Okerston, states N. P. has surveys at work on line from N. P. to Port Wing.

Wis., Superior—Railroad commission granted Steel Plant Traction Co., right to construct a line from Tower av. to the Steel Co.'s bridge over St. Louis river, 5 miles, work to begin in spring, completed early next fall. J. J. Wirtz, president.

NEW FIRMS INCORPORATED

Notes Arranged Alphabetically by States.

Minn., Duluth—Garden Lake Iron Co., capital \$500,000; R. J. Ryan and others.

Minn., Duluth—Seavey Timber Co., S. D. Seavey, Superior, Wis., and others.

Minn., Duluth—Garden Lake Iron Co., capital \$500,000; R. J. Ryan and others.

Minn., Foley—Independent Tribune Publishing Co., E. Nyman and others.

Minn., Glyndon—Glyndon Light & Power Co., A. J. Fitzsimmons and others.

Minn., Ironton—Ironton Motor Car Co., capital \$50,000; Garfield Murphy, president.

Minn., Minneapolis—Magazine Service Co., W. R. Peters and others; capital \$100,000.

Minn., Minneapolis—Edwards Electric Co., capital \$10,000; C. C. Edwards, president.

Minn., Minneapolis—H. E. Wilcox Motor Co., capital \$3,500,000. H. E. Wilcox and others.

Minn., New Ulm—Forschritt Publishing Co., capital \$10,000; Otto Friton and others.

Minn., St. Paul—New Brighton Investment Co., capital \$50,000; V. T. Conklin and others.

Minn., Tyler—Hermanson Drug Co., capital \$10,000; T. P. Hermanson.

Minn., Virginia—Dunka River Lumber Co., R. R. Scott and others.

Mont., Great Falls—Great Falls Welding Co., capital \$30,000. A. J. Jasmin and others.

Mont., Helena—Helena Theater Co., capital \$100,000; Chas. C. Conrad and others.

Mont., Medicine Lake—Medicine Lake Hall association, capital \$5,000. John S. Greggs and others.

Neb., Omaha—Turin Elevator Co., capital \$12,500; John K. Brown, president; J. L. Rinehart, secretary.



HOTEL RADISSON

MINNEAPOLIS, MINNESOTA

THE most complete hotel from the standpoint of architectural and engineering science.

The tallest, reinforced concrete building in the Twin Cities.

The only hotel in the Twin Cities that has complete high pressure steam generating plant, refrigeration plant, vacuum cleaning plant, air compressors and deep well pump, thermostatic heat control system, ventilating plant with air washers and thermostatic heat control on heating coils, complete laundry plant, electric maids' signal system, seven electric traction type, high

speed elevators, incinerator plant, master and secondary clock systems, automatic fire alarm system, circulating refrigerated drinking water system in every guest room, construction cost 43 cents per cubic foot.

Has the most popular and up to date dining room in the Twin Cities.

CHATEAU ROOM [A tribute to the French]

VIKING ROOM [A tribute to the Scandinavian]

TECO INN [A tribute to the American]

The Radisson Hotel is essentially a man's hotel, aiming to cater to man's daily needs.

Popular prices prevail in all departments.

This hotel is the only Modern hotel in the Twin Cities under the direct management and supervision of its owners.

N. D., New England—Simons Hardware & Furniture Co., capital \$25,000; E. L. Simons and others.

N. D., Wild Rose—Wild Rose Electric Co., capital \$5,000; F. V. Johnson.

S. D., Edgemont—Edgemont Electric Light & Power Co., capital \$25,000; Albert Herman and others.

S. D., Pierre—R. C. Brink Land Co., A. C. Brink and others, capital \$100,000.

Wash., Seattle—Colonial Timber & Lumber Co., capital, \$450,000; J. Griffith and others.

Wash., Tacoma—Jones Auto Lock Co., capital \$250,000; Robt. E. Evans and others.

Wis., Burlington—Laundry Products Co., Frank Sweibel.

Wis., Eau Claire—Northwestern Motor Co., capital \$25,000; Kim Rosholt and others.

Wis., Holmen—Holmen Canning Co., capital \$50,000; A. O. Jorstad.

Wis., Milwaukee—Western Motor Supply Co., capital \$25,000; R. F. Coerper and others.

Wis., Oshkosh—Peerless Floor Surfacing Co., capital \$30,000; Fred C. Horn.

Wis., Racine—Peterson Bolster Spring Co. has been incorporated with a capital stock of \$125,000, by Geo. C. Peterson, W. C. Peterson and Martin Christensen.

Wis., Sturgeon Bay—Sturgeon Bay Land & Investment Co., capital \$25,000.

Wis., Watertown—Watertown Grocery Co., \$60,000; Chas. A. Feisst and others.

Iowa, Manning—Independent Machine Co., R. C. Studeman and others, capital \$15,000.

Iowa, Marshalltown—C & E Manufacturing Co., capital \$10,000; A. R. Cooper and others.

Iowa, Mason City—Armory Building Co., capital \$60,000; C. W. Damon, president.

Iowa, Waterloo—Sandow Lines Co., J. M. Brearton, secretary; capital \$25,000.

BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Minn., Sebeka—Robb Plumbing Co., of Wadena, are installing a steam heating plant in the John Anderson store building.

Minn., Spooner—A. M. Robertson is building a store and pool hall.

Mont., Anaconda—D. G. Bertoglio will enlarge his store building.

Mont., Belt—Harry J. Skinner and R. S. Ford of Great Falls, will erect a 5-story building in Power City; cost \$200,000.

Mont., Butte—The new Miner's Savings Bank is nearing completion; cost \$40,000.

Mont., Butte—Fire damaged Lutey warehouse building, \$20,000; building owned by Swift & Co.

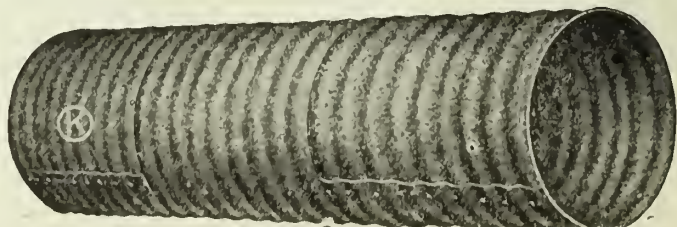
Mont., Cut Bank—J. B. Bruckhauser will make extensive improvements.

Mont., Fairview—H. S. Evans and Claire Hood have contract for postoffice building; also store.

Mont., Great Falls—Strain Bros. are planning a 2-story

S. D., Sioux Falls—The Firm of Bechtold & Fritz, jewelers

KLAUER'S "PERFECT" ROAD CULVERT



KLAUER MANUFACTURING CO. DUBUQUE, IOWA

RECENT LEGAL DECISIONS

PURCHASE OF WATER PLANT.

Janes et al, vs. City of Racine et al.—The acquisition by a city under the general public utilities act of the plant of a water company, which has accepted an indeterminate permit, is not a condemnation, but a "purchase;" St. 1911, providing that a public utility by acceptance of such a permit shall be deemed to have consented to a future purchase of its property by the city for the compensation, and under the terms and conditions determined by the railroad commission. The vote of the electors of a city to purchase, under the public utilities act, a water plant authorizes the city, without further vote by them, to issue bonds, if necessary, to procure the purchase money.—Supreme Court of Wisconsin, 143 N. W. R., 707.

DRAINAGE CONTRACTORS.

State Bank of Fairfax, appellant, vs. Peter Vlaar, et al., respondents.

1. Chapter 27, Laws of 1909, providing for the construction of town ditches requires the petitioners for the ditch to bear the entire expense of establishing and constructing it, and does not impose any liability upon the town. If the statutory prerequisites have been complied with, the contract price for constructing such ditch may be recovered from the petitioners, but cannot be recovered from the town.

2. The town officers, in performing the duties imposed upon them by this law, act as agents of the law and not as representatives of the town.

3. By the terms of the statute the contract price is not payable until the ditch has been inspected and the inspectors have filed a certificate that it has been completed in accordance with the order establishing it. A complaint which does not show that such certificate was made, nor that the facts were such that the inspectors ought to have made it and refused to do so, fails to state a cause of action.

Judgment affirmed.

Opinion of Commissioner Taylor.

EMPLOYERS' LIABILITY.

Irene Mitton, administratrix, appellant, vs. Cargill Elevator Co., respondent:

1. The evidence was sufficient to justify a finding that defendant was negligent in failing to provide a railing on a stairway leading to an engine room below, and in failing to guard dangerous machinery therein. Plaintiff's interstate was not an employee of defendant but was requested by it to go down into the engine room and turn off the engine. Held that defendant owed him the duty to use ordinary care in relation to guarding the stairway and the machinery. Whether chapter 288, Laws 1911, is for the benefit of any but employees is not decided.

2. The evidence did not leave the cause of death a matter of speculation or conjecture, but was sufficient to justify submitting to the jury the question whether defendant's negligence was the proximate cause of the death.

3. It did not conclusively appear that plaintiff's intestate was guilty of contributory negligence or that he assumed the risk.

GOOD ROADS IN SEVERAL STATES.

For road and bridge work in 1914, Plymouth county, Iowa, has \$135,000.

About \$20,000 has been received by Pocahontas county, Iowa, for its road fund, from recent sales.

Money is being subscribed on the Lincoln highway, Iowa, one personal subscription being \$1,000.

Denison county, Iowa, will probably raise \$30,000 for good roads including Lincoln highway.

Plans for the steel viaduct over the Iowa at Eldora, Iowa, have been approved by the state highway commission; 960 feet long; cost \$38,000.

The Keokuk-Montrose boulevard has been completed by the Mississippi Water Power Co., cost \$100,000.

Madison county, Missouri, has raised half of \$2,880,000 for 240 miles of hard surfaced roads, state to pay other half.

Douglas county, Minnesota, highway committee, recommends \$50,000 for road work in 1914, and does not favor macadam.

South Dakota by county and town levies for roads will have over a million dollars for that work in 1914.

Racine county, Wisconsin, will next year have a \$100,000 for road improvements; Milwaukee county, \$696,000, including 34 miles concrete road; Bayfield and Douglas counties \$100,000, inter-county roads; Dane county \$20,000 for road oil in 1914.

Wisconsin state highway commission estimates \$4,000,000 will be spent in the state in 1914 to build 14,000 miles of hard roads.—The (Des Moines) Road Maker.

CONCRETE MIXERS

The mixers described and illustrated here are in almost every case the latest models as they will be manufactured and sold in 1914. It has been impossible for The Improvement Bulletin to put to actual test the claims made for every mixer. For our information about each mixer we have gone straight to the man who knows most about it, namely, its maker. Practically all statements made can be backed up with letters from users. Prices on all mixers can be secured direct from the manufacturers at the addresses given. The manufacturers of the mixers described will be taken up in alphabetical order, according to the name of the company.

NAME—BLYSTONE CONCRETE MIXER.

MANUFACTURED BY—BLYSTONE MACHINERY CO.

ADDRESS—CAMBRIDGE SPRINGS, PA.

Name—Not given.

MANUFACTURED BY—Cement Tile Machinery Co.

ADDRESS—Waterloo, Iowa.

NAME—CHAIN BELT CONCRETE MIXER.

MANUFACTURED BY—CHAIN BELT CO.

ADDRESS—MILWAUKEE, WIS.

LOCAL AGENT—R. B. WHITACRE & CO., 205 S. Robert St., St. Paul, Minn.

For the chain belt drive, the great features of the Chain Belt Mixer, it is claimed that it is the most economical and reliable of any drive used. The makers guarantee the chain belt drive for a period of two years.

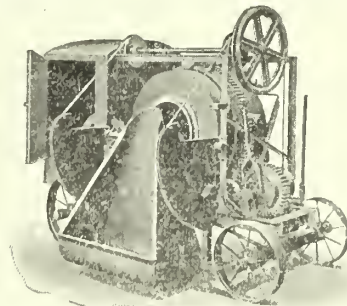
The drum of this mixer is made of cast semi-steel, one-half inch thick in the thinnest part. An exclusive feature is the bulge on the discharge side. Chain Belt Mixers are made in all sizes, ranging from 3½ cubic feet to one-yard capacity. A street mixer, a hot mixer and a mixer with power loader extension are also made.

NAME—CHICAGO CONCRETE MIXER.

MANUFACTURED BY—CHICAGO CONCRETE MACHINERY CO.

ADDRESS—MILWAUKEE, WIS.

Its users state that the Chicago Concrete Mixer is one of the simplest and most easily operated mixers on the market. The Chicago drum is a cylinder, to the inner periphery of which are riveted four scoop-like blades. The deep, converging sides of these scoops gather up the aggregate from all points in the drum and pour same to the center, through the narrow orifice formed by the high walls of the scoops. In this process, the relations of all particles in the mass are radically changed.



The No. 5 Chicago Special.

The frame of the Chicago Mixer is composed of Z-bar steel rigidly fastened together, the frame carrying the box supporting the shafts which carry the main rollers. This frame carries the driving bracket containing the main driving gears of the equipment. By having all of the running parts attached to this rigid frame, absolute alignment of all parts is assured at all times. This decreases the wear on the various running parts and increases their life materially. The Chicago mixer operates easily, economically, has few running parts, and such parts as there are, are easily renewed.

The drum on the Chicago Mixer has some features which make it stand out above all its competitors, the first and foremost being the center drive ring. This large heavy casting, encircling the center of the drum contains not only the gear teeth but also the main roller tracks embodied in one solid casting. This is additional assurance of perfect alignment.

(Continued on page 47.)

Minneapolis Branch:
522 Andrus Bldg.
Phone T. S. Center 5112
N. W. Nicollet 5112

K. F. LOTT & CO.

Northwestern Agents

ESTABLISHED 1899

ST. PAUL
101 E. 8th Street
(GROUND FLOOR)
Phones T. S. 68
N. W. Cedar 3208

Northwestern Terra Cotta Company



Largest Manufacturers
in the World of

HIGHEST GRADES OF

Architectural
Terra Cotta

and

Chimney Tops



Architectural Decorating Co.

PORCH CAPITALS—In classic and modern designs, all standard sizes and waterproof material.

COMPOSITION WOOD CARVING for all natural wood finish.

Ornamental Plaster and Staff.

Imitation Caen Stone.

Decorative Cement Work

Dumb Waiters. Reliance Ball-Bearing Door Hangers. Ash Cranes.
Mortar Colors, Insulite Waterproofing, Insulite Mastic Flooring, Side-
walk Elevators. Hand Elevators. Safety Treads. "Bitucoat". Bitu
Mortar Water-proofing Compound. Atlas Composition Flooring,



Luxfer



DELIVERS DAYLIGHT
WHERE WANTED

The one prism system
for daylighting buildings
that is calculated with
scientific certainty

Buildings that are Daylighted

Represent a greater money value

Contractors and architects specify and recommend Luxfer. It improves the building, the owner's position for greater profit, and their own for "come back" clients. For Luxfer serves scientifically, correctly and efficiently. Let our Daylight experts help solve your daylighting problems. Write for our book, "Luxfer Daylighting," sent free upon request.

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Duluth—310 W. Michigan St.
San Francisco—445-47 Turk St.
Milwaukee—Stroh Building
New York—507 W. Broadway
Cleveland—419-20 Citizens' Building
Indianapolis—20 Union Trust Bldg
New Orleans—904 Hennen Building
Philadelphia—411 Walnut Street
Detroit—Builders' Exchange
Rochester—38 Exchange Street
Dallas—Builders' Exchange
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THOMSON-WILLIAMS CO

L. H. WILLIAMS, Lakeside 270

CONTRACTORS IN Fama Stonewood, Marble and Tile, Concrete and Elevators.

DEALERS IN Brick of All Kinds, Waterproofing and Building Specialties, Hyrib, Metal Lath, Corner Bead, Asphalt Roofing and Cabots; Creosote Stains Carried in Stock for Quick Shipment.

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PHONES
Bell Melrose 1998
Ind Grand 1998

REPRESENTING

WAREHOUSE
22½ W. 1st St.

Atlantic Terra Cotta Co.
American Enameled Brick & Tile Co.
American Mason Safety Tread Co.
Samuel Cabot.
Cutler Malt Chute Co.
Federal Cement Tile Co.
David E. Kennedy.
Minnesota Fama Stonewood Co.
Stewart Iron Works Co.
Thorp Fireproof Door Co.
Trussed Concrete Steel Co.

MUNICIPAL IMPROVEMENTS

CITIES BUY PLANTS.

Madison, Wis.—With an order of the railroad commission toward turning over the property of the Beaver Dam Water Co. to the city at \$133,000, thirteen plants have been purchased by cities under the Wisconsin utilities law. In three cities the properties have been taken over in the past two weeks, and three cases are pending in which the valuation has been almost completed. The thirteen cities paid an aggregate of \$2,404,900 for the plants. In 1907 the legislature passed a law permitting utilities to take out indeterminate permits. The law empowers the city to take over a utility at any time at a valuation to be fixed by the railroad commission. Under this law practically all of the water plants of the state have become municipal enterprises. In Manitowoc the city has purchased the electric and water plants and there is agitation for the city purchasing the gas plant. Cities that have purchased plants are:

Cashton (electric)	\$3,100
Appleton (water works).....	255,000
Lake Geneva (water works).....	86,500
Manitowoc (water works).....	236,000
Brodhead (electric)	40,000
Manitowoc (electric)	137,500
Antigo (water)	128,800
Fand du Lac (water).....	320,000
Sheboygan (water)	415,000
Kaukauna (electric)	50,000
Whitewater (water)	75,000
Oshkosh (water)	525,000
Beaver Dam (water).....	133,000

A suggestion for an innovation in civic construction work which has many good features to recommend it has been made to the Winnipeg Board of Control by W. G. Douglas. He believes that by manufacturing cement curbing for street paving at the city shops during the winter months much time could be saved when construction work starts next spring. Experts have declared the scheme to be quite feasible, and the controllers favor it on the ground that it would give a good deal of work during the winter months to men who would otherwise be out of employment. It is even believed that the curb could be made at the shops quite as cheaply as on the streets.

MUSCATINE'S NEW CITY HALL.

Work on Muscatine's new city hall probably will be started as soon as possible in the spring. The plans are by J. E. Mills and Henry W. Zeidler, of Muscatine. The building will be 138x178, L-shaped, with portico and main entrance in the angle corner of the wings, which will be 91x37. The new hall will be entirely fireproof and will present an imposing appearance with its classic stone exterior. The architects have chosen the Doric order as best suited to the design, using full columns to support the roof over the central portico and a pilaster treatment on the ends of the wings. The interior of the building is well planned, great care having been taken to arrange the various offices as convenient and compact as possible without any waste of space. The cost of the building is estimated at \$70,000 exclusive of the furnishings. The structure will have three stories and a basement, the floor of the lower story being about three feet below the established grade. The exterior walls will be of brick with stone facing above the grade line and concrete below. The interior bearing walls will be of solid brick while the remainder will be of hollow tile. Reinforced flat concrete slab construction will be used for both the floors and roof, the former will be finished with cement in the offices and terraza in the corridors, while the roof slab will be covered with a composition roof. Hardwood finish will be used throughout. The building is to be heated with a modern steam heating apparatus. A balcony to seat several hundred will be provided in the council chamber.

SETTING SEMAPHORES BY WIRELESS.

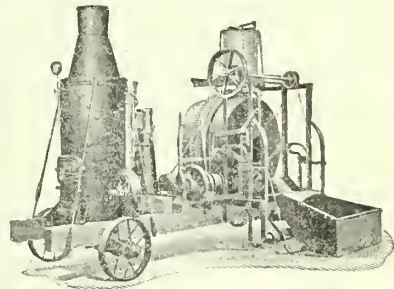
A series of extremely interesting experiments have been conducted by the Lackawanna railroad in the use of wireless telegraphy. Readers of these columns have already been told how this road turned to its wireless equipment not long ago when a severe storm of sleet put out of commission all its telephone and telegraph wires in its "mountain division." For two hours train orders were then handled by wireless, and 54 such orders were transmitted and received without a break.

CONCRETE MIXERS --- Continued.

ment as the driving gears and main rollers are thus kept in perfect relationship to each other at all times. By being one casting, longer life is assured and the danger of breaking is eliminated. By being in the center of the drum there is no chance for the concrete or loose materials to get into the gear teeth or on to the main roller tracks. This is a very important feature and its merit can be seen when this center drive is compared with various other drums where the driving gear and main roller tracks are on the outside edge in close proximity to the concrete, and where they are constantly covered with concrete, and their life materially decreased.

Standard Chicago on Trucks with Sideloader.

The No. 5 Chicago Special is an all steel, direct driven machine. By direct driven, we mean that the mitre gears, necessitated in the larger machines, are eliminated in this equipment. This makes a very compact, durable and economical machine.



The vertical acting sideloader on the Chicago mixer is a great improvement over the pivoted sideloader. The hoisting power is applied vertically and the skip hoists easily and discharges rapidly, and without any chance of clogging. The frame is low and compact and by the use of this auxiliary equipment the capacity of the machine is almost doubled.

The sideloader deserves attention. It is of the pivoted type, but instead of being fixed, is movable. This is made possible by the large cams as shown in the illustration. As the skip raises, the pivot point constantly raises, and in this way, there can be no dead center pull, so common in the ordinary pivoted sideloader. All high, overhanging frames are done away with, the equipment being a low down, easily operated attachment, adding materially to the capacity of the machine.

NAME—EBERLING CONCRETE MIXER.

MANUFACTURED BY—EBERLING CEMENT MACHINERY CO.

ADDRESS—CLEVELAND, OHIO.

The concrete mixer manufactured by the Eberling Cement Machinery Co. is undergoing improvements which will make it necessary to omit a detailed description of it till after the first of the year.

NAME—FOOTE CONCRETE MIXER.

MANUFACTURED BY—FOOTE CONCRETE MACHINERY CO.

ADDRESS—THE TEMPLE, CHICAGO, ILL.

(Continued January 3.)

NEW PATENTS.

The following patents were issued this week to Minnesota and Dakota inventors, as reported by Williamson & Merchant, patent attorneys, 925-933 Metropolitan Life building, Minneapolis, Minn.: Henning Alaterberg, St. Paul, Minn., combined self-cleaning filter and faucet; Nels L. Anderson, Spearfish, S. D., trace and tug buckle; Olaf Anderson, Erskine, Minn., bag holder; Cassius C. Avery, M. C. and I. A. Alvesson, Duluth, Minn., hanging tent; Sherman G. Berry, Tyn-dall, S. D., started for internal combustion engines; Walter A. Erkenbrack, Webster, S. D., heating coil for carburetors; Halvor S. Houkom, Minot, N. D., carpenter's gauge; Edward H. Lehrke, Crosby, Minn., fence post; Benjamin A. O'Neill, Minneapolis, Minn., pulverizing mill; Jacob Peterson, Webster, S. D., pipe jack or holder; Otto Rison, Sebeka, Minn., match safe; John C. W. Schopke, Lennox, S. D., strainer; Ernest W. Schur, Hibbing, Minn., cushion wheel; Norman A. Thomas, Staples, Minn., supplemental car stop; Menne Van Vroost, Herrold, S. D., beet harvester.

THE KETTLE RIVER COMPANY

PRODUCERS OF

Bridge Stone
Crushed Rock
Curbing Stone
Paving Stone

Kettle River Sandstone
Creosoted Materials
Cut Stone

Creosoted
Paving
Bridge Timber
Ties, Poles
and Piling

OFFICE 1111 PLYMOUTH BUILDING, - MINNEAPOLIS, MINN

Washed and Screened Roofing Gravel, Torpedo Sand
Concrete and Road Gravel, Cut Rough
and Crushed Stone

BIESANZ STONE CO.

WINONA,
MINNESOTA

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The accompanying illustration shows J-M mechanics applying pure cork sheets in the cold storage rooms of the new Gordon-Ferguson building, St. Paul, Minn.

All exposed surfaces of the two rooms, 60 feet by 60 feet by 13 feet high and 15 feet by 20 feet by 11 feet high, were covered with two 2-inch layers of 100 per cent pure J-M compressed cork sheets (broken joint construction) erected in Portland cement beds. Three walls of each room are self-supporting partitions built of cork sheets only. The entire surface was finished in Portland cement, giving a hard, per-



manent, sanitary finish. The working floor over the cork sheets consists of two and one-half inches of concrete. A temperature of from zero to 10 degrees F. can be maintained for forty-eight hours in these rooms when closed.

About 40,000 square feet (board measure) of cork was used.

These rooms are to be used for the storage of furs and skins, and will contain special racks and hangers for that purpose. The work was executed entirely by J-M mechanics, and is a credit to the insulation department of the J-M Co.

Anyone interested in cold storage work of any kind can obtain valuable information by writing to the Minneapolis or Milwaukee branches of the above concern.

LAYING A GLASS ROOF.

A contractor who has had some trouble in laying a glass roof or skylight stated that he laid one on a conservatory by lapping the glass and using ordinary putty in laying, but it leaked to such an extent as to render it of little use.

The glass roofs or skylights that consist of extra heavy glass laid in galvanized iron or steel frames should not be laid in ordinary glazier's putty, but in paste oil paint. The very best material for this purpose is paint skins, in paste form that have been run through a paint mill or a putty chaser, or, still better, that have been boiled over a fire in a kettle and softened somewhat by adding linseed oil. This remains elastic and does not crack; on the contrary, has the characteristics of rubber, when made from linseed oil paint skins.

However, if you simply lap the glass without frames as in the case in skylights, it is necessary to thin the paste somewhat and apply a strip of the semi-paste to the end of each under glass, and finally, when laid and paint has set, the ridge made by the top layers must be touched up with the same material in manner similar to that used when clapboard sides are painted, excepting that the paint must be much stouter.

BIG ST. PAUL BRIDGE PLANNED.

The proposition for a concrete parkway bridge to arch the ravine between Dayton's Bluff and the city proper, St. Paul, is meeting with support, according to John A. Seeger, president of the Dayton's Bluff Commercial club.

"Every one with whom I have spoken has been much interested," he said yesterday.

"The question is one of great importance to our section of the city. Nearly 40,000 persons who work in the downtown section are shut off from the city proper with only the 6th st. and 7th st bridges as means of access. These are inadequate and the people are placed at much inconvenience.

"The 3d. st. bridge will have to be reconstructed in a short time at the best."

Senator W. W. Dunn is chairman of this committee. Other members are Louis Betz, Dr. H. T. Echus, Mr. Seeger, Geo. J. Rank, Wm. Baumeister, Oscar Keller, A. C. Mahle, Edward J. Fuchs, E. A. Otto and Henry Ehlers.

BUSINESS INFORMATION

In this section will be found information relating to new devices and methods of construction; also mention of late catalogues issued by manufacturers of building materials and equipment.

Any catalog mentioned here can be seen at the office of The Improvement Bulletin, 912 Lumber Exchange, Minneapolis, where a complete file is kept.

Corbin Specialties, fully described, make up an entire book by that name, a copy of which has just been sent us. The line is certainly a most complete one and the name of Corbin is a sufficient guarantee of their quality.

Among the specialties are the Corbin concealed transom lifter, the concealed casement operator, the automatic exit fixtures, unit locks, and shutter operator. The plan followed is to give first a reproduction of one of the magazine advertisements, thus connecting the advertising with the catalog in the reader's mind, and then to follow this with complete detailed descriptions and illustrations, also specifications for architects. A handsome book, sent free on request by P. & F. Corbin, New Britain, Conn.

The Moline System of Vacuum Vapor Heating is fully illustrated in a handsome book recently gotten out by the Moline Vacuum Vapor Heating Co., of Moline, Ill. Not only are the advantages of the system fully pointed out and the features illustrated, but pictures of buildings and homes all over the country where the system has been installed, with letters from their owners, are shown.

J-M Sanitary Closet Fittings are pictured on a large folder published by the H. W. Johns-Manville Co., New York. It points out the chance for the plumbing supplies man to make money here and has in the corner a return postal card for his use.

The many architectural finishes, stains and specialties manufactured by the Glidden Varnish Co. are described in a little booklet published by them. This little catalog is more of a handy reference book for the use of the architect in locating the name of the finish he wishes to specify than anything else. It is complete and accurate and may be had free on request to the Glidden Varnish Co., Cleveland, Ohio.

Asbestone, a fireproof composition flooring material, is taken up carefully in a booklet printed by its manufacturers, Franklyn R. Muller & Co., Chicago, Ill. It is fireproof, sanitary and durable and has been much used in hospitals, hotels and theaters, to judge from the numerous photographs and letters of endorsement published. B. W. Ranson, Plymouth building, Minneapolis, is the Northwestern agent.

One of the most pleasing catalogs we have seen for some little time is gotten out by C. W. Breneman & Co., of Cincinnati, Ohio, to describe window shades of Brenlin. Strips of the material itself in all the different colors furnished, are pasted into the book, and it gives the user a very clear idea of how his new shades will look. Brenlin shades may be secured in Minneapolis from the New England Furniture & Carpet Co.

Evidently prepared by a good advertising man, the circular picturing Marion Excavating Machines is a most attractive one to look over. It shows the many kinds of excavating machines made by the Marion Steam Shovel Co., of Marion, Ohio, in actual use on almost every kind of work. The photographs are clear and the advantages of the Marion machines are apparent to the contractor at once.

The Carey Flexible Cement Roofing Specifications are printed in an interesting thumb indexed book which many architects will find useful. They can secure it on request to the Philip Carey Co., Lockland, Cincinnati, Ohio, and they will find illustrations showing the application of each kind of roofing described. The specifications are placed on the pages opposite the pictures and the whole book is very well gotten up. W. S. Nott & Co., Minneapolis, are local agents.

PILING FACE BRICK.

There are two methods in use for piling face brick. Some superintendents insist that brick can be handled much faster in loading them out by piling them on edge, face down, in straw. Others do this without any packing whatever. Damp and rotting straw, however, is apt to damage the face, or if the packing is omitted, the edges chip. The foreman cannot see how the sorting is done, either—another serious objection. Another method is to pile the brick face out on the flat, two courses high. The loader will handle four brick at a time, in loading these out, two in each hand, which is about as many as if piled on edge. The brick, of course, are not damaged in any way and the foreman can watch the sorting.

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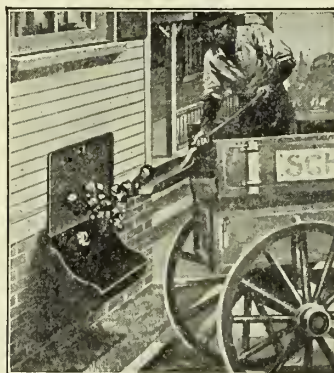
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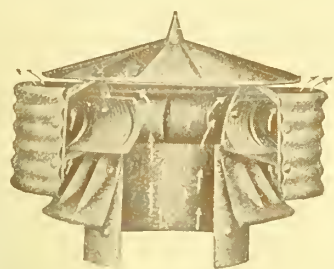
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(Each week in this space will appear a letter from different prominent contractors telling
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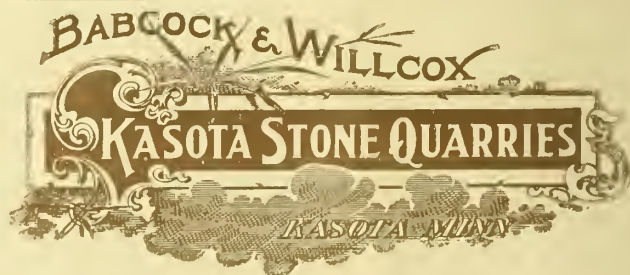


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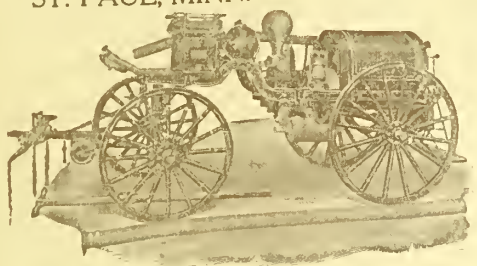
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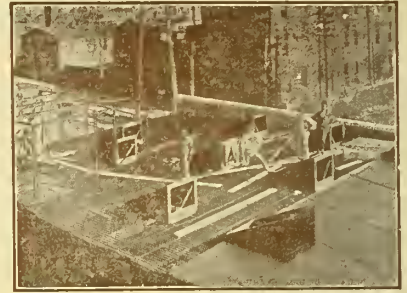
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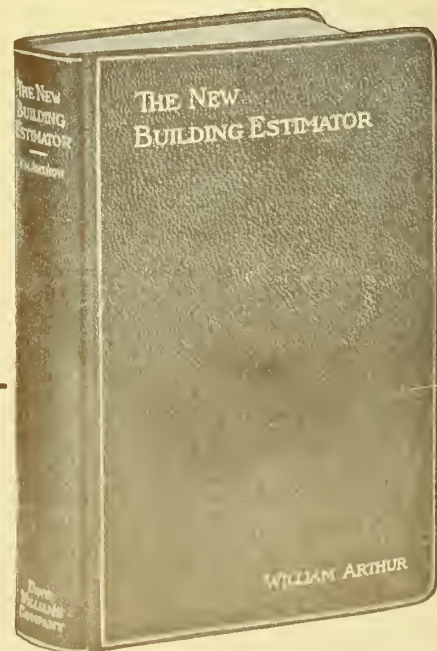
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VOL. XLVII

SATURDAY, JANUARY 3, 1913.

NO. 5

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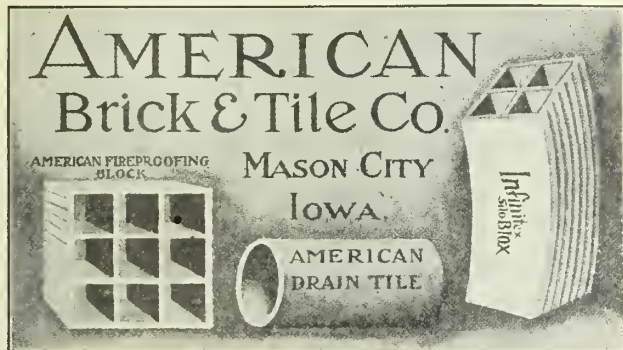
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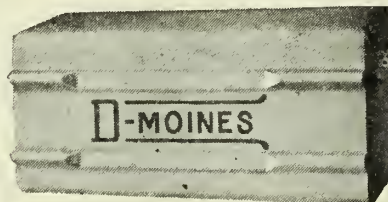
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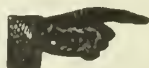
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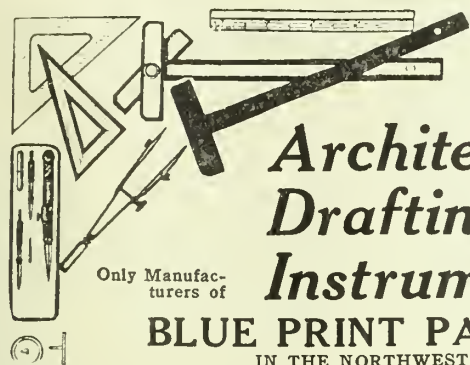
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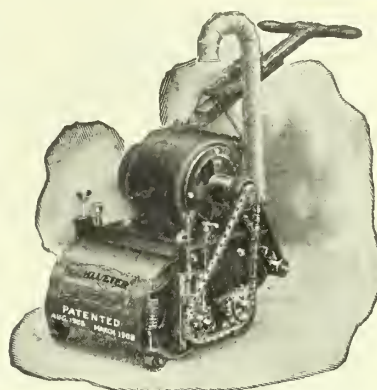


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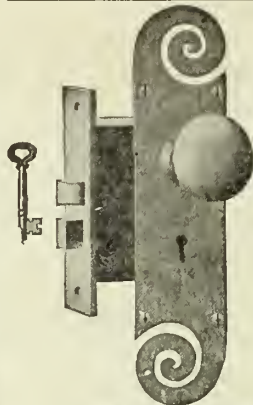
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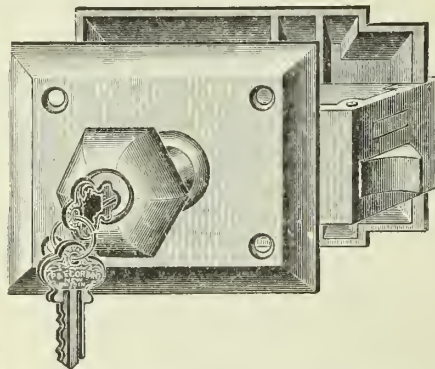
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The IMPROVEMENT BULLETIN

VOLUME XLVII.

SATURDAY, JANUARY 3, 1914

NUMBER 5

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EDITORIAL

O. L. COLBURN, Editor

REVIVAL IN STEEL TRADE.

Indicating further improvement in trade conditions, a report is received from Chicago, that prices are beginning to stiffen in the steel trade. This is bringing buyers and the question of delivery is expected soon to assume its importance. The railroads, which are known to be the very backbone of the steel market, and which under normal conditions are a good barometer of the steel trade, are beginning to place equipment orders in such quantities as to cause comment. It has been predicted on many occasions that the carriers would again enter the market before the end of the first quarter of 1914, but the attitude on the part of the larger trunk lines during the last two weeks is surprising even to the most optimistic and is taken as a very good indication that all business will soon be on a full-force working basis.

From Nebraska a statement reaches the Improvement Bulletin which reinforces the report of railroad activity. In recording improvements by the Union Pacific at one of its main points in the states the report adds: "Never before in the history of the road has traffic been so heavy as at present and all available rolling stock is in use on this division."

NEW YEAR'S GREETING.

For the new year of 1914 the Improvement Bulletin wishes all its patrons, present and prospective, a quota of happiness and prosperity big enough to satisfy the optimist and cure the less hopeful. It feels certain that 1914, as Mr. Carnegie, Henry Clews, and many others of long experience in big affairs, have predicted, will prove a period of great activity and thrift in the commercial world.

Improvements in the columns of the Improvement Bulletin will continue, and the special efforts we have made to be of utmost possible use and value to our readers will be sustained. Sources of information for our construction news, which have been increased to such an extent that the amount printed has been doubled, will continue to be added. There will be further articles by experts of first importance to architects, builders, dealers, manufacturers, engineers. Editorially the Bulletin will continue in its endeavors to be broad and progressive, with a desire to aid whenever possible in plans or enterprises looking to the best conditions in the building world. It is believed that our department of news, articles of business information and our illustrated articles will continue to interest as they seemed to have in the past.

Co-operation is a watchword for any newspaper, and especially for a trade journal. The Improvement Bulletin realizes this fully and during 1914 will continue to welcome suggestions looking to that end.

TECHNICAL EDUCATION'S IMPORTANCE IN CANADA.

National policy across the border has provided, so the observing writers over there say with conviction, the broad highway to industrial prosperity. The report of the Royal Commission on Technical Education and Industrial Training, in the judgment of the man who writes the history of Canada's commercial development fifty years hence will probably stand next in importance to the establishment of the National policy. The commission has, at least indicated how it should be travelled, says one writer.

It is asserted that the commission's proposal to spend \$3,350,000 annually for 10 years on technical education will receive both public and private support. The sum mentioned, while a round one, is regarded in Canada as moderate in contrast with the amount spent in other ways and in view of the importance of technical education to the industries of Canada.

HARMONY OF CITY ARCHITECTURE GETS A JOLT.

Efforts to have artistic harmony of architecture in the new fronts made necessary by the widening of St. Paul's downtown retail thoroughfare, Robert st., met with a setback. Napoleon harmonized Paris. It would require, it seems, a similar display of power in St. Paul to achieve uniformity in the remodeling of building fronts in the widening of the west side of Robert st., as hoped by architects. Property owners will not be able to co-operate in planning their new fronts to be harmonious in architecture, because of the different dimension in their property, said a builder.

CASH PRIZES FOR DRAUGHTSMEN.

Prizes for designs by draughtsmen of Minneapolis and St. Paul for a cover of a catalog to be issued by the Northwestern Fireproofing Co., Minneapolis, have been offered by the company in a circular sent to draughtsmen. The designs are to be delivered at the Minneapolis Architectural Club, 920 Nicollet av., until 5 p. m., Jan. 24. If colors are used, not more than three will be allowed. The prizes are \$60, \$40, \$25, \$15, and \$10.

NEW THEATER AT ST. CLOUD, MINN.

A new theater, the Starland, has just been completed at St. Cloud, Minn. It seats 912; fireproof construction, 44x132; front constructed of tapestry brick, furnished by the Belt Line Brick Co., of Minneapolis, trimmed with the St. Cloud gray granite, furnished by the Sauk Rapids Granite Co.; terra cotta standards furnished by the St. Louis Terra Cotta Co., through Birtram W. Ranson of Minneapolis. All windows in front are of art glass furnished by the Foreman-Ford Co., of Minneapolis; Carey's roofing furnished by the W. S. Nott Co. of Minneapolis; structural steel by the St. Cloud Iron Works; interior finish by F. M. Wright, St. Cloud; United States boiler with American radiation, heating and plumbing installed by J. P. Bisenius, St. Cloud; electrical wiring by the Grosse-Langford Electric Co., of Minneapolis, and electrical equipment and fixtures by the Central Electric Co. of Chicago; seating by the Andrews Seating Co. of Chicago; stage scenery by the Twin City Scenic Co.; ornamental plaster by H. S. Steinhuser of Minneapolis; interior decorations by the Lyseum Decorating Studios of Duluth, and draperies by the Frank Fandel Dry Goods Co. of this city. General contractor for the construction, Ed. Hirt of St. Cloud. Total cost of building, \$30,000. Owner and manager, Frank E. Nemec, who is also connected with the Princess Theater Circuit. The theater is for high-class vaudeville and moving pictures. The architect is Rolland C. Buckley of St. Cloud, who has designed a number of notable structures in St. Cloud and elsewhere.



WESTERN CANADA CONTRACTORS WILL MEET.

Contractors and builders and painters and decorators from all over Western Canada will meet in Edmonton the early part of February, when questions of importance to these industries will be discussed by the foremost men in the country. Though the exact dates have not yet been definitely fixed, they will be so arranged that the delegates attending one convention will be able to avail themselves, to some extent at least, of the other.

The Western Association of Builders' Exchanges will hold its first convention of the western body, which was divided from the eastern section of the last convention of the Canadian National Association of Builders' Exchanges.

For this reason it is the aim, says the Vancouver Architect, Builder & Engineer, of those who are organizing the programme to make the gathering an unqualified success, and although the entire schedule of business and discussion has not yet been drawn up, it is anticipated that from the point of view of interest the coming convention will be of as high an order as any of the previous national meetings.

A STANDARD SIZE OF BRICK.

Members of the Brick Builders' Bureau of San Francisco called the manufacturers of and the workers in clay products and structural steel of the state together for the purpose of determining the course of co-operation of those interested in these most important branches of building work. Producers and workers in brick, tile, terra cotta and structural steel met in a business gathering in the afternoon, and later in the evening a banquet was served at the St. Francis hotel. Both the business meeting and banquet showed conclusively the interest displayed in a reorganization of the bureau upon a sounder, more substantial basis. Many items of interest to the industry were discussed and gone over. A prime consideration was the size of the present common brick on the market in San Francisco and ways and means of making a standard size that the manufacturer, architect, designer and all who use brick may have a standard to work to, and not as many sizes as there are manufacturers. There was adopted a standard size brick to be 2 and 5-8 inches by 4 inches by 8 and 3-8 inches, and thus also necessitate the ordinary face brick to be the same size. A committee of the bureau was appointed to determine the time of effecting the change without in anywise disturbing the manufacturers' business. It will soon report to the bureau its findings, and then one of the

most vexatious questions of the industry will be settled by everyone concerned in the manufacture or use of this material. It was the consensus of opinion to organize the bureau to give building facts and make it of practical use to all concerned in construction work to show to the whole Pacific Coast the superior value of burnt clay in modern structures and foster a campaign of education for the use of brick, terra cotta, tile and structural steel. The harmony displayed by the several interests involved at the meeting certainly means an impetus to the work of disseminating high-class building information to the owners of buildings. Several plans of improving the construction of work that it may be held to a higher standard were outlined, and the bureau will gather all technical information on brick and brick construction, with details, and most likely put such in condensed form for general use. The latest book of the bureau was examined and was ordered distributed at an early date. The general enthusiasm of the whole meeting surely attests to the fact that all concerned are united in their efforts to place the industry upon a better basis and give to the public better construction. W. E. Dennison, president of the Bureau, carried the meeting and banquet to a splendid final conclusion in his capacity as toastmaster of the evening.

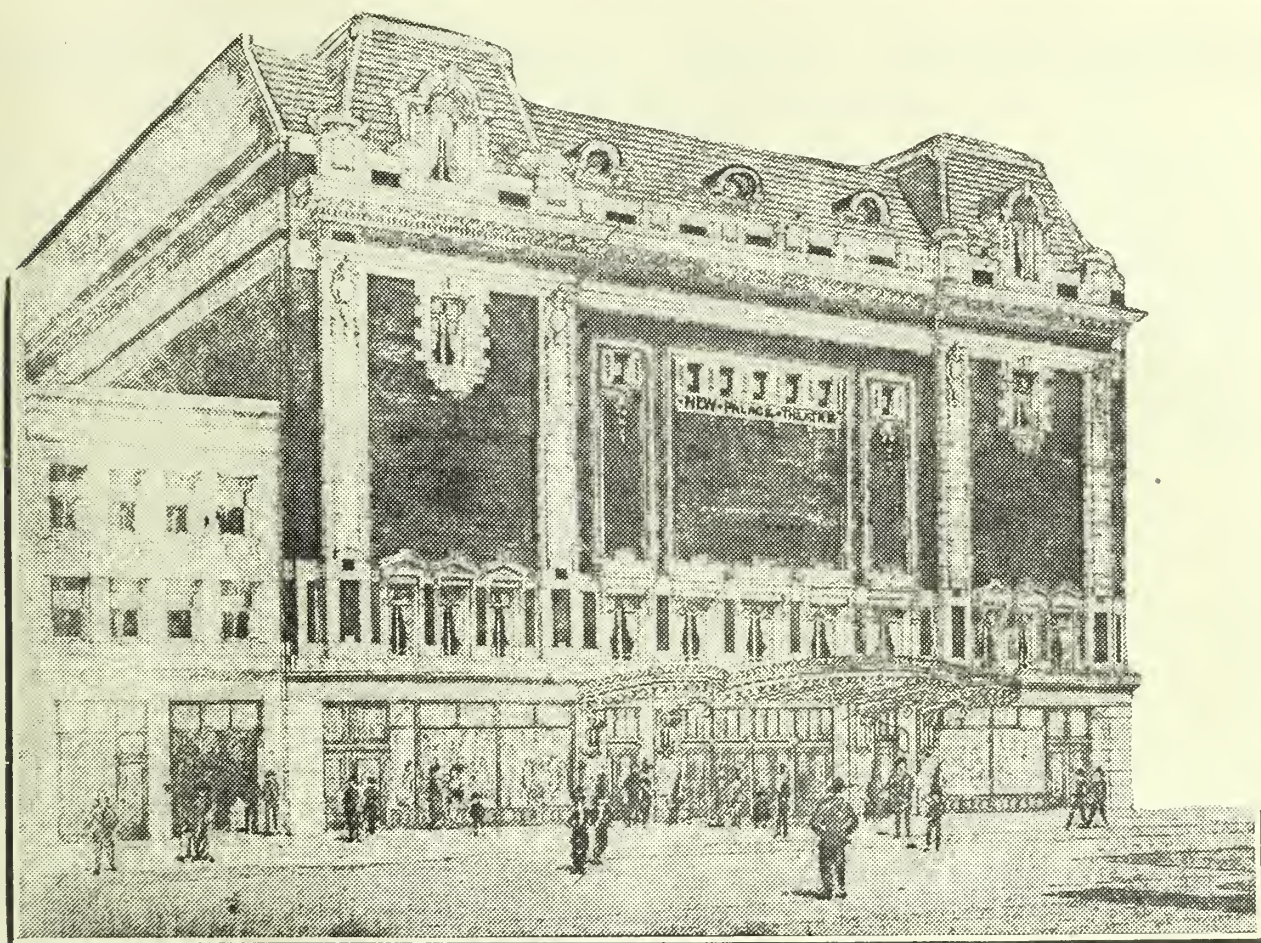
BIG CLAY DEPOSIT FOUND.

The greatest clay deposit in the state of North Dakota is said to have been discovered two and a half miles from Leith by men sinking a shaft for a mine. After repeated tests the supply seems almost unlimited. The clay, while fit for many uses, is said to be especially adapted to the manufacture of tiling. The supply of lignite coal for burning the clay and furnishing power for operating plants is large and makes the success of the plan all the more assuring.

LUMBER COMPANY CHANGES NAME.

Effective January 1, 1914, the present Thompson-McDonald Lumber Co. will become the John F. McDonald Lumber Corporation. There will be no other change than in the name the organization remaining practically the same. W. H. Bovey will continue as president of the company and John F. McDonald as treasurer and general manager.

In the last few years under the management of Mr. McDonald the company has made remarkable strides. The "One Piece or a Carload" policy will be continued by the company under its new name.



MINNEAPOLIS' NEWEST THEATER, THE PALACE, WILL BE PALATIAL.

In the construction of the new Palace theater, for which plans are being completed by Chicago architects, with Buechner & Orth of St. Paul, as supervising architects, it is planned to have the last word in theatrical architecture. It will have a frontage of 100 feet on Hennepin av. extending east from the insurance salvage patrol station and will extend back to the alley.

The architects have followed the latest inventions and innovations found in European countries, the general plan being after German theaters studied by I. H. Rubin of the firm. The auditorium will be without balconies, the seats being in one long sweep from below the stage to the ceiling at the front of the house. There will be walking room at intervals of ten or twelve rows.

A WORD FROM SECRETARY McADOO.

"Local Materials and Labor" is the subject of a circular letter received this week from the secretary of the treasury. He says:

"The department is frequently requested to include in its specifications for the construction, etc., of federal buildings the requirement that the successful bidder for the work shall use a particular material, fixture, appliance, or method, or that certain of the materials and labor to be used in the construction of the buildings must be obtained in the localities in which they are to be erected. The department is compelled to deny these requests for the following reasons:

"The law requires that proposals for the construction of federal buildings shall be solicited by public advertisement unless the public exigencies require the immediate delivery of the articles or performance of the services sought to be obtained. The obvious purpose of the law is to secure through broad competition the lowest terms obtainable. This object would be defeated if bidders were restricted to the products of any particular state or locality, or if the bidding were similarly restricted to residents of any particular section of the country.

"The department always declines to indicate by name or brand the particular materials, fixtures, appliances, methods, etc., to be used, but specifies the grade of both materials and labor. Bidders are free to procure these anywhere obtainable, provided they meet the specification's requirements.

"Nothing in the specifications for the different buildings prevents local contractors from bidding on the work.

Underneath the long sweep of seats there will be long wide tunnels for promenading. Then there will be retiring rooms, children's play room, smoking rooms and the like.

Both interior and exterior of the building will be done in marble and terra cotta in elaborate form. About 2,100 people will be accommodated in the auditorium and 500 in the boxes.

Adjoining the theater property which is part of the Elder Stewart estate, controlled by George and Herman Benz of St. Paul, plans are being drawn for a hotel built on lines similar to the Andrews hotel across the street. The plans are not definite, according to the Benz brothers, but will probably call for an investment of \$275,000. Negotiations have been on half a dozen times with men who proposed to erect a building on the site but each fell through in turn. The Palace theater will be ready for the 1914-15 season. It will be devoted to vaudeville and motion pictures.

Nor is there ever anything in the department's specifications which would prohibit a successful bidder residing elsewhere from obtaining his materials or labor from the manufacturers or dealers and the artisans of the locality in which the proposed building is situated, provided the specification requirements, as to quality, etc., are met.

"The department is always gratified whenever local materials and labor are found to answer its requirements, but it can not undertake to restrict competition by limiting bidders to local materials and labor. Whenever the department has information concerning an available local stone or face brick, it endeavors to draw its specifications so that proposals may be submitted on these materials, but can not do so to the exclusion of materials of the same class produced elsewhere.

HOW TO AVOID SLIPPERY PAVEMENT.

Engineering News: The superintendent of street repairs of San Francisco, Cal., has hit upon a method of removing the slipperiness from asphalt pavement as follows:

"The method of rendering the pavement less lippery is by heating the surface of the asphalt and then applying a layer of coarse sand, which is rolled into the pavement, which affords a sufficiently rough surface to enable horses to keep their footing and automobiles to pursue a straight course in wet weather. Experiences with this pavement on Fell st., between Baker and Scott, and on Scott st., between Fell and Waller, have proved so satisfactory that the city officials have decided to extend its use to other parts of the city.

PERSONAL AND GENERAL NEWS.

Doings of the Northwest this Week Boiled Down for Busy Readers

PERSONAL AND GENERAL.

S. W. Jonason & Co., general contractors, Aberdeen, S. D., had a good year during 1913 and are expecting a better one in 1914. Their 1913 record includes: Municipal building (fireproof) Aberdeen, S. D., \$100,000; Sacred Heart Catholic school, Aberdeen, S. D., \$50,000; St. Edward's Catholic church, Minneota Minn., \$30,000; city pumping station (fireproof), Aberdeen, S. D., \$10,000; State Bank of Taunton, Taunton, Minn., \$5,500; Minneota Creamery, Minneota, Minn., \$3,500; Rumley Products Co., Aberdeen, S. D., \$2,500.

G. P. Merrill, president, and G. P. Jones, general manager of the Hedley Gold Mining Co., have been on a visit to Victoria in connection with their power development plans on Similkameen river.

G. Watkins Evans has returned from his examination of the Alaska coal fields for the United States government and has resumed practice as consulting engineer at Seattle.

Contractor Roland J. White, of Great Falls, Mont., who has been in charge of the construction of a four-mile section of the railroad grade on the Choteau line of the Milwaukee, immediately west of that city, last week announced that he had concluded the labor and had stored his working apparatus and stabled his livestock in winter quarters. Mr. White will remain in Great Falls several days and will then go to California, where he and Mrs. White will spend the winter.

Frank N. Armstrong, mechanical engineer, of the Penn Iron Mining Co., of Vulcan, Michigan, promises something of interest in the way of a hydro-electric shovel in the spring. He is hard at work on the problem and has the machine partly constructed.

The MacArthur Concrete Pile & Foundation Co., 11 Pine st., New York City, has received a third contract from the Standard Oil Co. for about 1,300 Pedestal concrete piles at their Eagle works, Claremont, N. J. C. E. Graff, superintendent, and Thomas Parker, chief engineer of Eagle Oil Works.

The MacArthur Concrete Pile & Foundation Co., 11 Pine st., New York City, has been awarded the contract covering the foundations of the new baggage and dormitory building for the U. S. government at Ellis Island, New York Harbor. Pre-molded piles will be used for this work. H. H. Peterson Co., 1328 Broadway, New York, general contractor. F. S. Howell, engineer for government.

Secretary Williams, of the St. Paul Builders' Exchange, is quoted in The Pioneer Press as follows: "The meeting of the State Association of Builders' Exchanges, at Duluth, was successful. A committee was appointed to investigate the organization of a mutual insurance company of employers to take care of risks under the new workmen's compensation law. The rates charged by the stock companies now in business are exorbitant."

A. J. Ostrander, contractor, of Bismarck, N. D., is making a specialty of modern, compact, cozy cottages. One secret of his ability to make these cottages so compact is that he uses the disappearing beds which close into the wall and can be "made down" in ten seconds ready to occupy. These beds are a California invention and but a few have been seen in the east and these are the first to be installed in this state. He sent for one of each of the styles of beds which he has installed in his houses. One occupies but 22 inches of space in the wall, while another swings into a closet where the clothing may be kept also, and occupies but about 30 inches of space. The swinging bed is so constructed that it may be swung onto a porch for sleeping purposes, and in case of storm or sudden cause for moving into the house, it may, in 30 seconds' time, be swung inside the house and be ready for occupancy.

An amusing letter has been received by the Southern Cypress Manufacturers' Association from Ketchikan, Alaska. "Received your farm leaflets. Thanks. Kindly send prices on shingles twenty inches wide, one inch thick and four feet long." Shingles of the dimension mentioned are considered "some shingles" by local manufacturers, but few manufacturers have had Alaskan experience.

The T. H. Smith Stone Co., of Sturgeon Bay, Wis., has awarded a contract to the Stevens-Adamson Co., of Aurora, Ill., for the erection of a large storage plant at their crushed stone quarry near the mouth of the bay. Officials of the company hope to have the plant completed by March 1, 1914, so that they can get a supply of crushed stone on hand before the opening of navigation. The storage plant will have a capacity of 15,000 tons of stone.—Rock Products.

The National Engineering & Construction Co. was granted an accounting last week at Milwaukee, against the county by Judge Eschweiler, to determine the amount due on seventeen of its claims for expenses alleged to have resulted from

the change in the construction plans of the Grand av. viaduct. Six of the twenty-three claims were dismissed. The company claims that after the construction of the bridge began the sectional plan was substituted by monolithic. This they say cost them \$300,000 additional. The company contends that it was not responsible for the change.

The Quimby Stone Co., of Mason City, Iowa, a few days ago announced the purchase of a 22-acre tract of land, adjoining the M. & St. L. tracks, says Rock Products, upon which will be erected a stone crushing plant of the most modern type. This will give the company direct railroad connection, and simplify to a great extent the marketing of the company's product. Plans for the new plant have not been fully worked out, but the cost will be in the neighborhood of \$15,000.

The state highway commission has sent to the auditors of all Minnesota counties maps showing roads recommended as state highways. Under the law county boards have the initiative in designating roads, but they must be approved by the state commission.

Felix Trainor, a member of the firm of Trainor Brothers, contractors and builders, who has resided in Minneapolis for 35 years, died at his home, 99 Highland av., Saturday. Mr. Trainor, who was 60 years old, came to America from Ireland when a young man and learned the building trade in the east. He came to Minneapolis in 1878 and until recently was actively engaged in business. Mrs. Trainor, with seven sons and two daughters survive, six children, Vincent, Leo, Joseph, James, Emmett, Paul and John and Mrs. Albert Gannon and Catherine Trainor of Minneapolis. Two brothers, J. W. Trainor of Chicago and Dennis Trainor of Minneapolis also survive.

Last week negotiations were closed whereby the Twin City Hardwood Lumber Co. succeeds to the business of the Twin City Hardwood Co. The change came about through the purchase of the holdings of John Burmeister, who was chief stockholder of the former company, by Henry E. Gipson, Harry V. Sutton and David Dworsky. The reorganized concern has as its officers Henry E. Gipson, president; H. B. Sutton, secretary and David Dworsky, treasurer. The active management will be in the hands of Mr. Sutton and Mr. Dworsky.

The Bull Tractor Co., capitalized at \$1,000,000, filed application for articles of incorporation and as a result of contracts entered into by president, P. J. Lyons of the new corporation and president, J. L. Record of the Minneapolis Steel & Machinery Co., the latter company will be putting out fifty tractors a day by Feb. 20, and in the early part of 1914 one of the most important industries obtained for Minneapolis in many years will be operating. The Minneapolis Steel & Machinery Co. has agreed to make 20,000 tractors a year.

E. R. Cobb, secretary of the Duluth Builders' Exchange, was in the Twin Cities Christmas week, with Mrs. Cobb. He was among the many callers of Secretary Williams of the St. Paul Builders' Exchange and Secretary Young of the Minneapolis Builders' Exchange.

B. Rivenes, architect, Miles City, Mont., will occupy new quarters in the Melligar building early in March.

City Engineer Cappelen of Minneapolis, who went to Panama and Central America on his vacation, said that the railroad between the ocean and San Jose, capital of Costa Rica, is the greatest piece of engineering he ever saw.

Perkins, Fellows & Hamilton, Chicago architects, have received a commission to design a group of buildings for the new Shantung Christian university at Tsinan, Shantung, China, at a cost of \$750,000, also for another group of buildings for the University of Nanking.

Richards-French Co. has been incorporated, capital \$100,000, to deal in lumber, building material and other merchandise; Charles J. Winton, Minneapolis; D. N. Winton, Minneapolis; E. C. Tellotsen, Minneapolis; L. D. French, Wadena; J. M. Richards, Bemidji.

Janesville, Wis., carpenters and contractors are making elaborate preparations for the entertainment of the delegates to the second annual convention of the Wisconsin Master Carpenters' association which will meet in that city on Jan. 9 and 10.

Oshkosh, Wis., Builders' & Traders' Exchange has moved to new quarters where it will have a kitchen and facilities for serving lunches. The new headquarters probably will be opened formally at the regular meeting of the exchange on the second Thursday of January. L. W. Duckerschien is the president of the exchange. The other officers are: John Edwards, secretary and treasurer; executive committee, M. C. Mertz, Joseph Pitz, Albert Ebernau, Louis Larsen and Joseph Staudenraus.

ARCHITECTS AND ENGINEERS.

E. H. Hewitt, as chairman of the housing committee, Civic and Commerce Association, has sent a letter of protest to the council against any relaxations, as special favors to owners, of the building ordinances on light, air and sanitation.

Professor H. B. Mathews, of the engineering department of the South Dakota state university, has been appointed state statistical agent for South Dakota by the United States bureau of statistics. Professor Mathews was graduated from the state university in 1892. He is also secretary of the State Alumni Association.

John Howatt, a graduate of the University of Minnesota, thirty-two years old, was certified by the Chicago civil service commission for appointment as chief engineer of the Chicago board of education. The position pays \$6,000 a year. Mr. Howatt stood highest among twenty-nine applicants. He has been an inspector for the United States Treasury in charge of mechanical equipment.

Competing in a field of thirty-nine, Raeuber & Mehner, architects, of Manitowoc, were awarded second prize on plans submitted for a new \$300,000 court house at Edwardsville, Ill. Decision in the competition was made by the special committee, with advisory architect, N. Clifford Ricker. Some of the best known architects of the country competed for the plans, Robert G. Kirsch, of St. Louis, being awarded first prize; Raeuber & Mehner, of Manitowoc, second; Len F. Steube, Danville, Ill., third, and Rose & Peterson, Kansas City, fourth. Under conditions of the competition all architects to receive consideration must be licensed in Illinois and the fact that the license of the local firm was issued too late, probably had some bearing and may have defeated the firm for first prize.

The problem of lighting the farm by electricity is to be made the subject of a thesis for two post-senior students of the engineering college of the university, W. R. Everett and E. F. Critchett, under the direction of Professor George D. Shepardson.

S. L. Bartlett, architect for the Great Northern railway, was in Butte inspecting the new station recently.

J. W. Bliss, state engineer and state mine inspector, made a trip to Williston, N. D., during the week and inspected the Husebye-Ellithorpe coal mine, opened up two and a half miles east of the city last fall.

George W. Cooley, engineer of the state highway commission, returned recently from the convention of the American Roadmakers' Association in Philadelphia. Mr. Cooley read a paper before the association on gravel roads, using the Minnesota roads as illustrations. After the meeting he went to Washington and was in consultation with Congressman W. S. Hammond and the war department relative to an appropriation to build a bridge over the Pigeon river on the Ontario boundary. He was informed that there was no precedent for making such an appropriation. While in the east Mr. Cooley attended a meeting of the directors of the American Highways Association in Baltimore.

C. A. Forbes, of the state highway commission engineers' staff and secretary of the Minnesota state organization of engineers, addressed a public meeting at Ada, Dec. 13, on good roads.

Committees representing engineering clubs of St. Paul met at the Commercial Club to discuss the feasibility of renting rooms. Among the organizations represented at the meeting were the St. Paul Civil Engineers' Society, St. Paul Mechanical Engineers' Society, St. Paul Electrical Engineers' Society, the engineering department of the state highway commission, the local branches of the American Mechanical Engineers' Association and American Civil Engineers' Association. The Club's plan jointly to obtain headquarters for their various meetings is the forerunner of a movement to erect an engineers' building within the next few years.

H. J. Williams, architect, and for thirteen years a resident of Spokane, died in Sacred Heart hospital in that city a short time ago. Mr. Williams designed this hospital, which was his last piece of work of any magnitude, being taken ill before completing the final plans and never recovering sufficiently to continue his practice. When retiring from active work he turned his practice over to Albert Held. He was 73 years old at the time of his death.

B. E. Mehner, architect, of Manitowoc, Wis., was a visitor in St. Paul during the holidays.

A. M. Burt, new chief engineer of maintenance of way, Northern Pacific, has begun his duties in St. Paul. He has been stationed at Spokane.

G. Alexander Wright, architect and engineer, addressed the architects, engineers and principal building contractors of Milwaukee at the Hotel Wisconsin on Monday, following a dinner. Mr. Wright has been speaking to architects, engineers and builders throughout the U. S. and Canada on estimating methods and building arbitration.

George A. Pallister, formerly with McKim, Mead & White,

New York, and Harold H. Hills have opened office, as architects in the Scott building, Salt Lake City, Utah, and will be glad to receive samples and catalogs.

A. L. Dorr, architect, has gone to California to spend the winter months.

CEMENT AND CONCRETE

Sioux City Tribune: It is reported that Chicago officials, after a visit to Sioux City and inspection of our concrete paved streets, have ordered 40 miles of concrete paving for Chicago's streets. This should prove gratifying to Mr. George C. Call, of this city, who in 1910, as we note from consulting the file of The Tribune for August 22 of that year, installed a section of concrete paving near his residence on 16th st, west of Pearl, and convinced the city council of its utility. Incidentally, this bit of enterprise on the part of an individual citizen had much to do with the reduction of the cost of paving in this city to an average of about \$1.20 per square yard.

The concrete road near Mason City, Iowa, which is being built by Ben Lampert, of Oshkosh, as county engineer, is the subject of a special article in Engineering and Contracting. The first mile of the improved road between Mason City and Clear Lake—the first mile of concrete road in Iowa—was recently completed. A flat sub-grade was used, for a width of twenty-eight feet. Concrete was laid, seven inches thick at the center and five and one-half inches at the sides. Concrete was used for 16 feet, in the center and on each side of this concrete slab was built a four-foot shoulder of gravelly clay. Two feet further out, on each side is the slope to the drain tile. The table of costs showed \$1.12 a square yard.

E. S. McGowan of the Minneapolis staff of the Universal Portland Cement Co. gave an illustrated address on concrete roads at Albert Lea, Dec. 17, which the local press referred to as interesting and valuable.

The cement block and tile factory at Ringsted, Iowa, which burned last August will be rebuilt and reopened in the spring.

BRICK AND TILE NEWS

President Cobb of the Builders' Exchange, Minneapolis, who is also an official of the Hydraulic Press Brick Company's Minneapolis office, attended the face brick dealers' and manufacturers' conventions at French Lick, Ind. He says it was an extremely valuable meeting and mentions as an especial point of interest that after a long series of presidents of the manufacturers' association from the southern parts of the country one was chosen from north of the Ohio, Joseph W. Moulding of Chicago. Among the new vice presidents of the dealers' association are F. J. Nixon of the Paine-Nixon Co., Duluth; Geo. Schwartz of Ricketson-Schwartz, Milwaukee; Herman L. Matz of S. S. Kimbell Co., Chicago. S. Siwart Smit of the Twin City Brick Co., was elected a director of the manufacturers' organization. S. J. Hewson of the Hydraulic Press Brick Co., Minneapolis, attended. Mr. Smit gave an address on "What Manufacturers and Dealers Owe Each Other."

The clayworkers of Wisconsin will meet in annual convention in Milwaukee Thursday and Friday, January 13 and 14. The convention headquarters will be at the Republican House. Secretary S. Weidman, Madison, Wis.

A. C. Ochs Brick & Tile Co., Springfield, Minn., having had an excellent season, is enlarging its plant and preparing for a second plant next year.

V. E. Piollet, of the Washington Brick, Lime & Sewer Pipe Co., Spokane, was in Seattle recently, making tentative plans for the transfer of the company's Portland office to a Puget Sound point. C. T. W. Hollister is manager of the coast office.

James F. Elliott, manager of the Spokane Pressed Brick Co., returned recently from a visit to the principal sand-lime brick plants in the U. S. He is interested in the promotion of another plant in the state of Washington.

GOOD YEAR FOR THE GILT EDGE.

A rhyme from the Associate Manufacturers' Supply Co., 245 McKnight building, Minneapolis, records in numerous expressive verses the success of Gilt Edge Boilers in 1913. There has been a good business also in the company's Central Brass Quick Pression Faucets; Peerless closets; pressed metal radiation. The company kindly sends Gilt Edge compliments of the season. The Improvement Bulletin unites in the wish that 1914 may prove happy and gilt edged for everybody.

CONSTRUCTION & CONTRACT NEWS

OF SPECIAL VALUE TO ENGINEERS, CONTRACTORS, BUILDERS AND MANUFACTURERS

MINNEAPOLIS, MINN.

Office: 912 Lumber Exchange. Phones: N.W. Main 3902; T.S. 2194.
Please telephone news not later than Wednesday.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

N. O. Johnson, 4605 Garfield av., 1-story plaster veneer dwl.	2,500
Homebuilders' Construction Co., owners and builders, 2741-43 Aldrich av. S., repairing frame dwl. and alterations.	3,000
Homebuilders' Construction Co., owners and builders, 3322 37th av. S., 1½-story frame dwl.	2,000
A. C. Landon, 2516 Elliot av., alterations to frame dwl. into duplex; Tyler & Co., builders.	3,000
Mrs. Pauline E. Fairbairn, 4435 S. France av., 1-story plaster veneer addition to dwl., plaster veneer.	1,000
Calhoun Commercial Club, 711-15 W. Lake st., 6-story brick and reinforced concrete "Calhoun Commercial Club"; F. N. Hegg, builder.	85,000
Katherine Humphrey, 3557 24th av. S., 2-story frame dwl.; Andrew Anderson, builder.	2,500
Geo. L. Wertman, 3720 11th av. S., 2-story plaster veneer dwl.; Frank S. Nordin, builder.	2,800
Alfred Olson, 3453 31st av. S., 1-story frame dwl.	2,000
John E. Magnuson, 2608 S. 7th st., 1½-story frame dwl.	2,500
Geo. N. Suffern, 3824 11th av. S., 1-story plaster veneer dwl.; contract not let.	2,500
Andrew Johnson, 1064 25th av. SE., 1½-story frame dwl.; Otto Wallenc, builder.	1,600
W. H. Barber, 834 Chandler st. SE., 1-story concrete and reinforced concrete boiler house.	2,000
John E. Andrus, 36 and 38 S. 6th st., 1-story brick 2d story addition and interior alterations.	6,000
J. Schmidt Brewing Co., 7-story brick, steel and concrete stock house, Webster near Palace; Lauer Bros., builders	35,000
F. C. Pratt & Co., 3720 14th av. S., 1½-story frame dwl., 1232 Montreal; F. C. Pratt & Co., builders.	1,000
Boston Ground Rent & Trust Co., alterations, 363 Robert near 4th; S. Nelson Const. Co., builders.	11,500
St. Paul Water Dept., 1-story brick storehouse, Hamline near St. Anthony.	20,000

Building of an ornamental concrete bridge in 19th av. S., to be a duplicate as far as possible of the proposed 3d av. structure, is now planned by the city council. The city engineer has been directed to draw the preliminary plans and to submit an estimate of the cost at the next council meeting. A steel bridge was originally ordered by the council for both 3d and 19th avs. Action on the former was rescinded and a concrete bridge ordered because it would be more ornate and in keeping with its surroundings. Plans for the steel bridge recently adopted by the council were resigned to give the most durable structure at the least cost. The city engineer estimated that the bridge would cost \$285,000. It is said that a concrete bridge could be built under \$325,000. The proceeds of the \$650,000 bond issue for bridge purposes will be delivered to the city comptroller Tuesday. No work, except a little preliminary clearing can be done for several days, however. The city engineer must wait for the plans of the Concrete Steel Engineering Co. He telegraphed the company to hurry and at least submit plans for the sub-structure to allow an early start. Work must be begun by Jan. 27, for on that date the permit of the war department to build a bridge at that point expires. In case a concrete structure is ordered at 19th av. S., it would take several weeks to complete the plans. Work on this bridge could not be begun in that event until late in February.

*Figures compiled by Jesse Wakeman of Building Inspector Houghton's staff, show Minneapolis had most substantial growth during 1913. The number of commercial structures in the divisions of mills and factories, stores and warehouses, shows a marked increase over 1912. The number of buildings in 1913 was 232, valuation, \$3,219,080; 1912, 214 buildings, valued at \$1,120,670, an increase for 1913 of \$2,100,000. This is nearly treble the value of the commercial structures in 1912. The total number of factories and mills in 1912 was 19, valued at \$115,800; total in 1913, was 18 buildings, one less than in 1912, but a valuation far greater, aggregating \$1,584,935, or more than ten times of the cost of mills and factories in 1912. In 1912, 130 stores were built valued at \$695,230; in 1913, 123 stores, valued at \$750,005. The number of warehouses in 1912 was 65, cost \$309,580; in 1913, 91 warehouses, valued at \$884,140. In dwellings and apartments the city held its own. In 1912, total number of dwellings and apartment houses was 2,065, valued at \$4,466,310; in 1913, 2,007 buildings, valued at \$4,317,142. These figures, showing a proper and complete analysis of building statistics for the city, are a result of a complete system of records which cannot be found in use anywhere else in the country.

*Hennepin county surveyor in annual report has recom-

mended road improvements in the county including the following for 1914: Completion of improvement on road to Excelsior, about 3 miles yet to be graded between W. Minneapolis and Excelsior; grading and graveling 12 miles, Eden Prairie road; raising shoulders and filling with gravel Lake st. blvd., 13 miles; Watertown road 9 miles, remaining to be graded and gravelled; 10 miles Osseo road, to be regaveled in Maple Grove, Dayton, Hassan townships; Lyndale av. road, to be resurfaced with gravel and clay; Cedar av. road, 4 miles to be reggraded and macadamized; all town roads through Hennepin county, about 1,000 miles, should be improved; 425 miles county road in bad condition; 70 of 166 bridges in good condition, remainder temporary wooden structures.

Miller-Davis Printing Co. 213 Nicollet av. are making arrangements for the construction of a 5-story structure to cost \$75,000, on property adjacent to the Security National Bank building. President Otto W. Miller of the company said that the company plans the construction of a plant that will be in every way modern. The property formerly a part of the Hamlin estate, recently sold to Vitalis Fisher for \$40,000, has been bought by the Miller-Davis Printing Co. from Mr. Fisher. It has a frontage of 44 feet on 4th st. and adjoins the building of the Northwestern Automobile Co. on 4th st. between 2d and 3d avs. S.

Preparations for the new 20-story home of the First National Bank and general offices of the Soo line have been advanced by the removal of the Minneapolis Trust Co. from its quarters in the present 1-story first National Bank building to temporary quarters on the first floor of the New York Life building. The trust company building will be completed in April and then the First National Bank will take temporary quarters there. Immediately the present First National Bank building will be razed and the work of erecting the skyscraper will be rushed. The building will cost in the neighborhood of \$1,200,000 and will be modeled after the First National Bank of Chicago.

L. A. Hickok & Son, contractors, 619 Flour Exchange, are building an elevator and detached iron-clad power house, (capacity 40,000 bushels) west of Stanton, N. D.; private plans; owner Star Elevator Co., Jamestown, N. D.; also elevator and detached iron-clad power house (capacity 40,000 bushels), west of Stanton, N. D.; private plans; owner Occident Elevator Co., Minneapolis; frame.

*Bids for dredging Lake Nokomis, 2,600,000 yards, received by park board ranging from 9.3c to 15c a yard, none accepted.

*Dorr & Dorr, architects, Lumber Exchange, report contractor flat building alterations at 11th st. and 1st av. N., let to Carlstad Bros.; ten 1-room and 2-room apartments with bath, kitchenettes, wall beds, wiring, plumbing, hardwood floors, new front and rear porches, etc.

Hewitt & Brown, architects, 715 4th av. S. will have plans ready next week for a suburban residence near Excelsior, Lake Minnetonka, for H. M. Robbins, frame, stucco, 56x34, and 21x23, 2-story, brick base on concrete, steam heat, wiring, plumbing, probably tile mantels; shingle roof, hardwood floors and trim; cost \$15,000; general style Japoneseque; bids will be taken about Jan. 15.

A frame dwelling will be changed into a duplex by the Homebuilders' Construction Co., 228 Plymouth building, at 2745 Aldrich and repairs made after fire; plumbing heating, wiring; cost \$3,000; company also is building a frame dwelling, at 3372 37th av. S.; 24x36, concrete foundation, hardwood floors and trim, hot water heat, plumbing, gas; cost \$2,800.

C. L. Pillsbury, consulting engineer, Metropolitan block, issued plans for the mechanical equipment of the model school, Normal school, Winona, this week; bids in Jan. 15; electric wiring, steam heat, ventilating, plumbing, plans for mechanical equipment New Ulm school will be out Jan. 5; Elliott hospital plans out soon.

*Two large flat buildings will be built at 1812 Stevens, by Chas. C. Chase, Security Bank building; 46x128, 3-story, brick, 31 flats each, bath and kitchenette, steam heat, electric light, and bells, concrete and brick foundation, gas ranges, hardwood throughout, laundry, cost \$25,000 each; owner will build.

*F. W. Kinney, architect, Plymouth building, is preparing plans for a residence at Blue Earth City, Minn., for Leo Eckhard; 24x42, 2-story, frame, stucco exterior, vapor heat, wiring, bath, sleeping porch, leaded glass, oak and birch finish and floors, cost \$4,000; plans ready in ten days.

Pike & Cook Co., general contractors, have placed their

Tarvia

*Preserves Roads
Prevents Dust~*



River Road, West Lafayette, Indiana. Constructed with "Tarvia X." Photographed two months after the flood.

This road was 10 feet under water

The roadway illustrated above runs along the banks of the Wabash River at West Lafayette, Indiana.

In March, 1913, the great floods raised the river to the white mark on the tree at the left of the picture, completely submerging the macadam roadway.

This stretch of road was constructed in 1911 with "Tarvia X," and the condition of the highway after the flood gives ample demonstration of the fact that a Tarvia-bonded roadbed is waterproof.

Tarviated macadam sheds an ordinary rainstorm immediately. Water does not percolate into the surface or loosen the Tarvia bond.

In this instance, the road got more than

an ordinary wetting but after the waters receded the macadam was found still in excellent condition, unchanged in contour, and ready for traffic without any attention or repairs.

"Tarvia X" is a dense, viscid, coal tar compound of great adhesive power and immune from damage by water or weather. Used as a binder, it so increases the strength of the macadam as to make it automobile proof and erosion proof. The saving in maintenance expense and the prolongation of the life of the road more than balance the cost of the Tarvia treatment.

Booklets on request.

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THE TURNER MUSHROOM SYSTEM

REINFORCED CONCRETE FLAT SLAB CONSTRUCTION

(Patented)



The above cut shows an interior view of the Griggs-Cooper Candy Factory, St. Paul, Minn. Note how the flat ceiling increases the clear head room by allowing the sprinkler system and conduits to be placed close to it.

The recent decision of the Hon. Chas. A. Willard in the U. S. District Court of Minneapolis in the Drum vs Turner concrete patent case sets at rest pretended claims of Mr. Turner's imitators.

All infringers are being rigidly prosecuted, as Mr. Turner has in his employ at the present time five of the best known and most able firms of patent attorneys in the United States.

OWNERS, PROTECT YOUR OWN INTERESTS by demanding that your flat slab designers furnish an infringement bond of an amount equal to the cost of your building. Demand a bond for a five-year term and make yourselves safe.

THE MUSHROOM SYSTEM

is the original reinforced flat slab system and is the only legitimate flatslab on the market today.

Designs and Estimates furnished by

C. A. P. TURNER

808-821 Phoenix Building

MINNEAPOLIS :: MINNESOTA

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order for Monarch metal weather strips with Oscar F. Symons & Co., 838 Plymouth building for the 8 additional floors at the McKnight building; Hewitt & Brown, architects; installation of weather strips will be started very soon.

*Geo. L. Wertman, 3752 11th av. S., is building a 2-story plaster veneer dwelling at 3720 11th av. S., 24x27, concrete foundation, hardwood floors and trim, plumbing, gas, \$2,800; Frank S. Norden, builder, 3425 Park av.

L. A. Tyler, 240 20th av. N., has taken figures on additions and improvements in a store at same address; brick, composition roof, structural iron; Haugen & Newstrom, architects, 212 Iron Exchange building.

*Henry Gelwicks, 4412 Zenith S., will build a 2-story plaster veneer dwelling at 4505 S. Abbott, concrete block foundation, 24x30, hot water heat, hardwood floors and trim, plumbing, wiring, \$3,000; day labor.

N. O. Johnson, 2912 Garfield, will build a plaster veneer dwelling at 4605 Garfield, 28x38, 1-story, concrete block foundation, hardwood floors and trim; hot water heat, plumbing, gas, \$2,500; day labor.

*A duplex will be built by Nathan Schlomer, 1037 N. James, 26x48, plaster veneer, hardwood throughout, electric light, plumbing, laundry trays, cost \$4,200; contract to Mandel Bros., 1021 Bryant av. N.

A frame dwelling will be changed to a duplex at 2516 Elliott av., by A. C. Landon; plumbing, heating, wiring, hardwood floors; cost \$3,000; Tyler & Co., 2730 Nicollet, contractors.

The S. Swenson Artesian Well Co., 256-258 Plymouth av., have received contract for drilling a 12-inch well about 800 feet deep, at the new Booth Fisheries Co.'s building in this city.

Long, Lamoreaux & Long, architects, 830 Hennepin, have prepared plans for an addition and interior alterations at 38 6th st. S. for J. E. Andrus; day labor; 44x66; cost \$6,000.

*Bids were rejected on altering pavilion at Lake Harriet, and plans will be changed; low bid was \$13,909, about \$3,000 too high; Harry W. Jones, architect, Lumber Exchange.

Purcell, Felck & Elmslie, architects, Auditorium building, have started plans for a residence at Owatonna, Minn., for Dr. J. H. Adair; concrete foundation, frame, stucco.

E. H. Sund, architect, 431 Andrus building, is taking figures on a residence in the Lake of the Isles district, owner's name withheld; frame shingle roof, hollow tile.

J. F. McCarthy, artesian well contractor, 407 6th av. S., has been awarded the contract for the deep well for Elbow Lake, Minn. He has begun drilling.

*Catherine Humphrey, 1860 E. 24th, is building a 2-story frame dwelling, 24x26, hardwood trim, plumbing, gas, \$2,500; Andrew Anderson, builder.

Otto Wallene, 926 17th av. SE., is building a frame dwelling for Andrew Johnson at 1064 25th av. SE., 1½-story, hardwood trim, plumbing, gas.

W. H. Barber, 1501 Hamline av., is building concrete and reinforced concrete boiler house at 834 Chandler st.; 40x40, 1-story; cost \$2,000.

*Funds are being raised for a \$60,000 building by directors of Maternity hospital.

WINNIPEG, MAN.

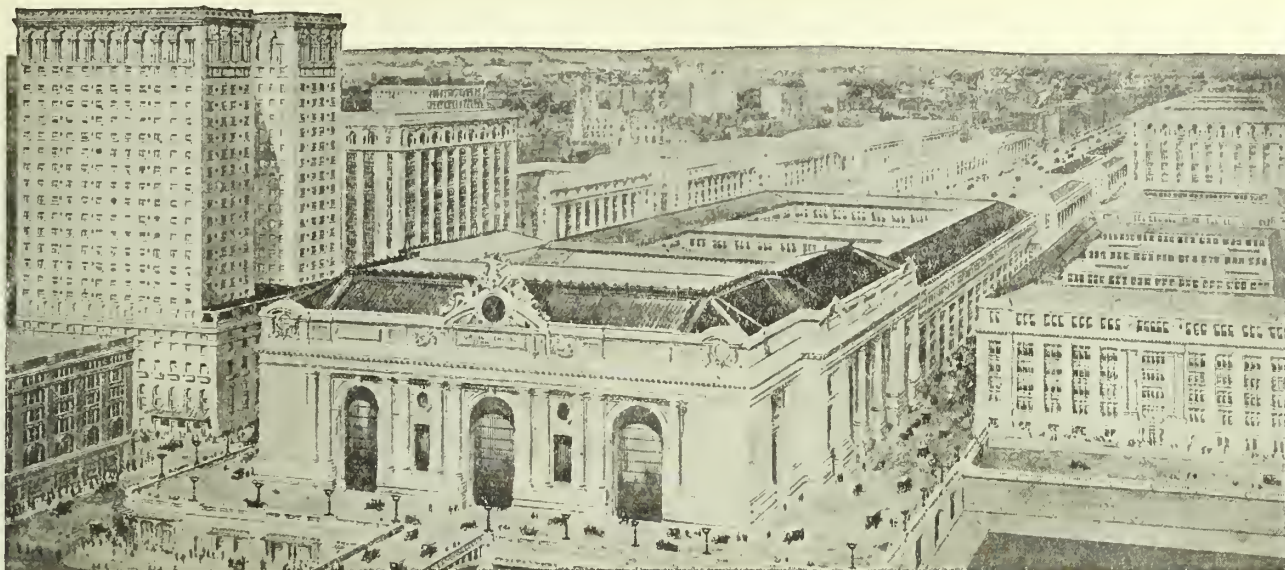
The following permits were issued: The Great West Permanent Loan Co., additional permit of \$40,000 for addition to building on west side of Main st. between Portage and Graham avs.; Granston & Pilgrim, dwelling, Keewatin st., \$2,800; W. Metelnicke, two dwellings, Tweed st., \$4,800; J. Silverman, two dwellings, Manitoba av., \$4,400; J. Lowery, dwelling; Lipton st., \$3,000; Olympic hotel, east side of Smith st., between Portage and Ellice, a permit was issued for the Marquee, \$1,000; J. W. Phillipson, dwelling on Garwood st., \$2,700; S. O. Olafson, dwelling on Ingersoll st., \$2,500; A. Dubois, dwelling on Alfred av., \$2,000; Allan & Montcalm, two dwellings, on north side of Tweed av., \$4,800.

Tenders were wanted to Jan. 22, by chairman, board of control, for manufacture, delivery and erection in the power house at Point du Bois of one head gate lifting mechanism, including the necessary accessories.

Tenders were wanted to Jan. 5, by chairman, board of control, for supply of pole type and subway transformers required during 1914.

The Knights of Columbus association new building was damaged by fire and will likely be repaired shortly; loss \$5,000.

The board of control agreed that the city should erect fireproof dwellings for the working people.



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New York Central and Pennsylvania Terminals

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if the work is properly done by reliable contractors, it will remain as long as the building stands.

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It is also significant that a very large part of the purchases was Barrett's Specification Pitch and Barrett's Specification Tarred Felt, the best grades of pitch and felt made.

To anybody interested in waterproofing, we should be very glad indeed to supply further information on request.

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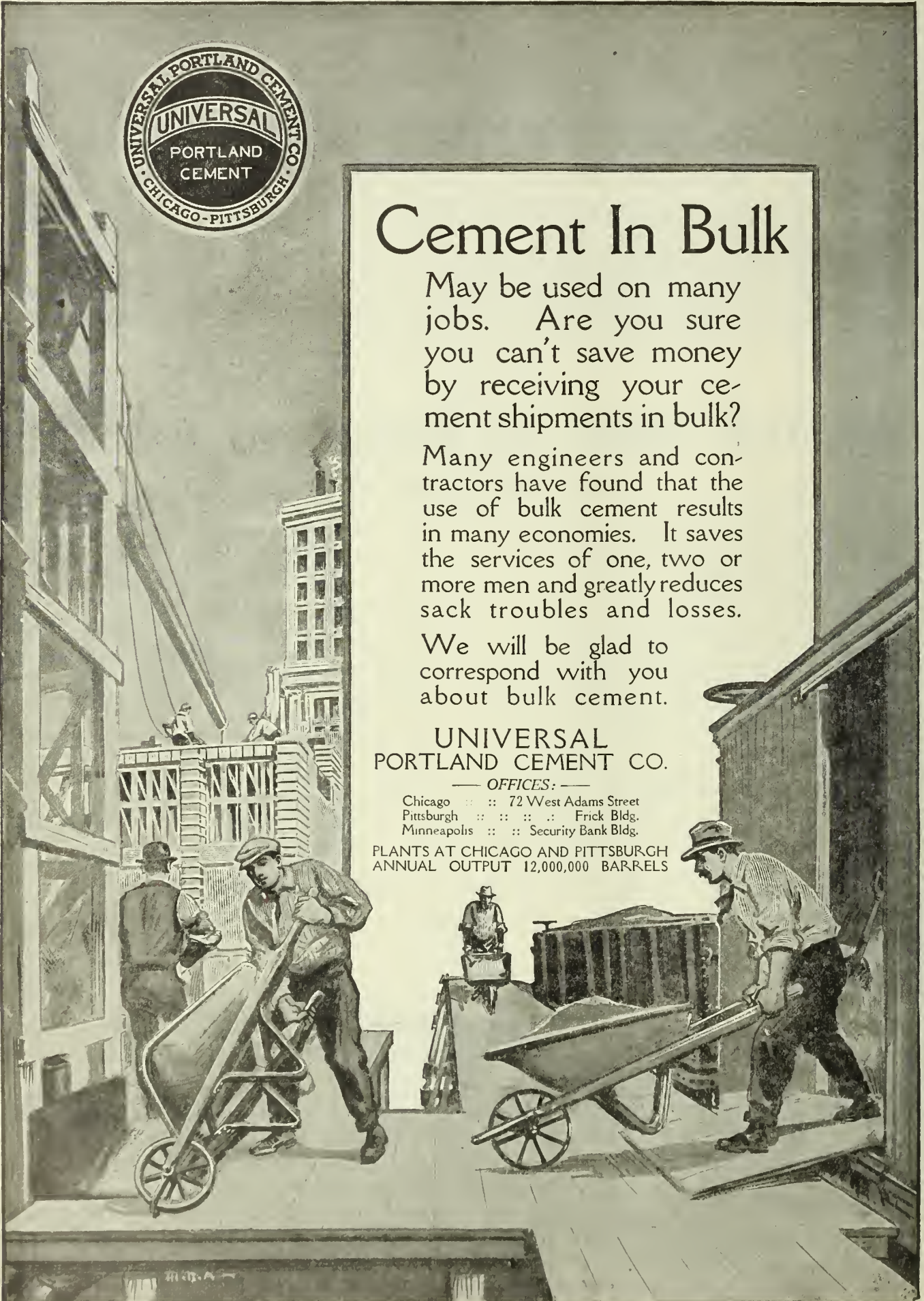
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BUILDING PERMITS.

Margaret Farnum, 230 W. 6th st.; Margaret Farnum, builder.....	1,600
Mrs. E. T. Chapman, Hartland, Wis., 2-story frame dwl., 1717 Capital near Aldine; A. J. Erlanson, builder.....	2,900
R. L. Coborn, Autumn av., 2-story frame dwl., Autumn av. near Hazel; R. L. Coborn, builder.....	1,200
H. J. Butvinick, St. Paul House Furnishing Co., 2-story frame dwl., E. 14th near Jackson; B. Schmuckler, builder F. C. Pratt Co., 3720 14th av. S., 1½-story frame dwl.; F. C. Pratt Co., builders.....	3,800
Joe Appel, 1762 Princeton, 1-story frame dwl., 1762 Princeton near Baldwin; Joe Appel, builder.....	1,000
M. P. Ryan, 813 N. Y. Life bldg., 1-story brick motion picture show house, Selby near Dale; John Molini, builder.....	2,000
Jacob Bosma, 1654 Selby, 2-story brick veneer flats (4), Ashland near Fry; F. S. Nordni, builder.....	11,500
Henry Gelwicks, 4505 S. Abbott av., 1½-story plaster veneer dwl.....	9,500
Chas. C. Chase, 1812 Stevens av., 3-story brick apartments (31); Chas. C. Chase, builder.....	3,000
Chas. C. Chase, owner and builder, 1818 Stevens av., 3-story brick apartments (30).....	25,000
	25,000

C. H. Johnston, architect, Capital Bank building, is completing plans: insane asylum (cottage No. 8), 3-story and basement, 50x120, \$55,000, Anoka, Minn.; mechanical engineer, C. L. Pillsbury, 805 Metropolitan Life building, Minneapolis; Downer Mullen, secretary board of control, St. Paul; press brick, terra cotta, reinforced concrete, fireproof construction, structural iron; insane asylum (cottage No. 9), 3-story and basement, 50x120, \$55,000, Anoka, Minn.; press brick, terra cotta, reinforced concrete, fireproof construction, structural iron.; school for blind (fireproofing and remodeling north wing), 4-story and basement, 50x100, \$55,000, Faribault, Minn.; engineer, C. L. Pillsbury, 805 Metropolitan Life building, Minneapolis; Downer Mullen, secretary board of control, St. Paul; press brick, stone, reinforced concrete, fireproof construction, metal cornice, structural iron.

The Northwestern Frog Switch Co. has purchased property and will locate its plant in North St. Paul on the property of the old Enterprise Manufacturing Co. An automatic switch invented by Louis Dunn of St. Paul will be the principal switching device the new concern will manufacture. The company will begin business with a capital of \$50,000 and will start shortly after Jan. 1. All of the machinery has been purchased and will be ready for installation in a few days. A number of St. Paul men have taken an interest in the new industry. The officers of the company are C. W. Arnquist, New Richmond, Wis., president; M. O. P. Schwartz, Stillwater, vice president; J. C. Kindervater, New Richmond, treasurer, and Emil J. Soderstrom, secretary.

Building costing more than \$2,000,000 will be built along Robert and adjoining streets next spring. Cushing & Driscoll announced that if an agreement can be reached with one lease holder the Chamber of Commerce building 6th and Robert sts. would be torn down and a \$100,000 retail building erected by R. M. Bradley and others of Boston. Davis & Lagerman state the trustees of the Boston Ground Trust at 5th and Robert sts, occupied by the Northern Pacific would be rebuilt; cost \$40,000. Work started. Wm. Hamm will build adjoining the corner property, and facing on 5th st. in the spring, 50 feet on 5th st., 50 feet on Minnesota.

*An arcade building described as largest in the country is announced to be built by Adolph and Otto Bremer on 7th, Robert and Minnesota, in connection with the arcade building now under way in place of burned McArthur store; 6-story, 250 on 7th, 125 on Robert, 330 feet 6th st., 50 feet on Minnesota; plans by Buechner & Orth, Shubert building; cost \$750,000, construction expected to begin next spring, fireproof.

A building probably will be erected by Dr. A. W. Wharton on Robert st. directly adjoining the property of the Boston Ground Rent Trust. The contract for the erection of the new \$1,500,000 Merchants National Bank likely will be let within ten days. Dennis Ryan completed negotiations with the Northwestern Trust Co. for \$400,000 to remodel the Ryan hotel.

*Bids will be received until 2 p. m., Jan. 31, for construction of the Roman Catholic church of St. Martin, Huron, S. D., plans at St. Paul Builders' Exchange and at office of architect, E. L. Masqueray, Endicott building, brick, stone foundation, modern, plumbing and heating not in general contract.

Contracts let on repairs and changes in store at 339 E. 7th; general contractor, John H. Donahue, 660 Gilfillan building, plumbing let to John E. Holt, 171 E. 6th st.; electric work to the Stinson Electric Co., 245 W. 3d st. E. J. Donahue, architect, Gilfillan block; W. L. Perkins Co., 311 Robert, owner.

Figures are being taken on parochial school, Osceola, Wis.; 3-story and basement, 49x52; architects, Alban & Hansler,

407 Commerce building, St. Paul; owner Blessed Virgin Mary church, Farmington, Minn.; Rev. Jos. Schell, pastor, will receive figures; brick tar and gravel roofing.

*Mrs. E. T. Chapman, Hartland, Wis., will build a 2-story frame dwelling at 1717 Capitol, between Alfine and Wheeler, 24x26, hardwood floors and trim, hot water heat, plumbing, gas, wiring, sleeping porch, mantel, \$2,900; A. J. Erlanson, 1368 W. Minnehaha, builder.

*Jacob Bosma, 1654 Selby, building a 4-flat on Ashland between Fry and Pierce; 2-story, brick veneer, 39x51, hardwood trim and floors, electric light, gas, laundry, tile vestibule, electric bells, flat roof; cost \$9,500; F. E. Norden, 4325 Park av., Minneapolis, builder.

*H. E. Erickson, architect, Union block, has prepared plans for a 1-story store, for Ellsworth A. Needles, 643½ Canada, 23x48, brick, metal bars, steel ceilings, tile, store front, tar and gravel roof, galvanized iron work, hardwood floors and finish, plumbing.

*Contract for all copper work on new Cathedral including dome, roof, towers, and chapels, awarded to Hoy Construction Co., Metropolitan building, at \$71,000; will also do tile roofing on percentage; E. L. Masqueray, architect, Endicott building.

The interior of the old Merchants National Bank building, recently purchased by the Bremers will be rearranged by A. Moorman & Co., for the new National Bank of Commerce, which will occupy its new premises about January 15.

C. H. Johnston, architect, Capital Bank building has sketches completed for St. Matthew's Episcopal church, St. Anthony Park. Rev. E. E. Haupt, pastor, 2205 Scudder av.; shingle roof, limestone, cement plaster.

Watson P. Davidson, Pioneer building will build a large modern residence on Summit between Farrington and Virginia; cost \$50,000; retaining wall of Kettle River sandstone.

Bids received till 10 a. m., Jan. 3, by K. E. Alexander, city purchasing agent, for furnishing structural steel roof trusses; for addition to filtration plant; check for \$100.

*Permit was issued for the 7-story brick, steel and concrete stock house for Schmidt Building Co., on Webster between Palace and James, 44x80, cost \$35,000; contract to Lauer Bros., foot of Chestnut st., excavation started.

Union station officials will meet again in January, probably in Chicago, when plans for changing the river bed will be considered, and submitted to Col. Potter, U. S. engineer.

*Margaret Farnum, 299 W. 6th st., is building addition to residence on Maplewood between Lyndale and Summerwood, cost \$1,600, plumbing, wiring, hardwood trim.

*B. Schmuckler, 233 E. 13th, has the contract for the residence of H. J. Butwinick, St. Paul House Furnishing Co.; plans by H. A. Miller, Pittsburgh building.

Immanuel Congregational church, Cromwell av. and Territorial road, So. St. Anthony Park; superstructure started; Rev. W. N. Payne, pastor.

*A frame bungalow is being built by Joe Appel, 1762 Princeton, 26x38, hardwood trim, plumbing, gas, \$2,000, 1762 Princeton.

Bids for the almshouse will be asked for soon; work on west wing to begin within a few weeks.

Fire damaged the Bridge Square block, 3d and Wabasha, \$7,000; Pabst Brewing Co., owner.

Fire damaged the frame warehouse of the Independent Bag Co., 800 N. Aldrich.

SIoux CITY, IOWA

Sioux City Office: 310 Iowa Building; R. V. Sager, Representative.

BUILDING PERMITS.

Julius Christiansen, frame dwl., Higman's Second addition.....	3,500
Erick A. Johnson, frame dwl., Davis' addition.....	2,000
S. J. Hansen, two frame dwls., C. B. Rustin & Co. addition.....	2,000
Chris H. Jorgensen, frame dwl., Sioux City East addition.....	2,000

H. M. Herman, 310 Iowa building, has started construction of a house at 2519 Pierce st. The foundation has been laid. It will be an 8-room house, 2-story and basement, strictly modern, frame construction, will have sleeping porch and will cost about \$4,000.

Geo. W. Burkhead, architect, Grain Exchange building is drawing plans for an opera house for Ed. Credit at Otto, Iowa. It will be 40x100, 2-story and basement, cement block and brick construction and will cost about \$6,000.

The new concrete reservoir for the city has been treated with a waterproofing coat on the interior and the tests thus far have not disclosed any leaks or damp spots. The old reservoir will be enlarged in the spring.

Geo. W. Burkhead, architect, Grain Exchange building is drawing plans for two houses for Mrs. Greding at 26th and Pierce sts. They will be 30x56, frame construction, one and one-half story and will cost about \$3,000.

The sash and door factory of the John J. Keefe Co. burned with a loss of \$11,000.

PROPOSAL ADVERTISING FOR BIDS

PROFESSIONAL DIRECTORY

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address of leading firms who can
supply you.

THE
Improvement Bulletin

OFFICIAL ADVERTISEMENTS for proposals will be published in this department on receipt of copy with order from authorized official, building committee, architect or engineer.

RATE FOR NOTICES in this department—15c per line each insertion. No discounts allowed. Several insertions are customary to insure full and fair competition.

PRINTED SLIPS are furnished to officials, architects and others interested, for distribution by them, without extra charge.

PROFITABLE INVESTMENT.—It has been the experience of those who have used this medium that by investing a few dollars they have saved hundreds.

COPY RECEIVED up to Friday, 10 a. m., will be published in the paper, delivered to subscribers on Saturday, but should reach the publication office, Lumber Exchange, Minneapolis, earlier in the week, when possible.

LATE NOTICES Friday morning can be transmitted by long distance telephone.

BITUMINOUS PAVEMENTS

Sioux Falls, So. Dak.

Sealed bids will be received by the Board of Commissioners of the City of Sioux Falls, S. D., at the office of the City Auditor, up to 9 o'clock a. m., of Monday, the 26th day of January, 1914, for the construction of pavement on Prairie Avenue from the north line of Third Street to the south line of Twelfth Street.

Bids will be received on each of the following kinds of pavements; Bituminous, Tarvia Macadam, Asphaltic Concrete and Dolarway, to be constructed in accordance with the plans and specifications on file in the office of S. B. Howe, City Engineer of said City.

Each bid must be accompanied by a duly certified check for the sum of \$1,500.00 drawn on some known solvent bank of the City of Sioux Falls and made payable unconditionally to the City Treasurer of the City of Sioux Falls, S. D., as a guarantee that the bidder will, his bid being accepted, enter into a contract with and furnish the required bond, to said City.

The work will consist of approximately the following quantities; 15,000 sq. yards of pavement outside of street car tracks; 3,000 sq. yards of pavement along street car tracks.

Specifications and blank form of proposal may be obtained from S. B. Howe, City Engineer.

Each bid must be endorsed on the outside with a statement showing the work covered by the bid and must be filed with the City Auditor before the hour above mentioned.

The right is reserved to reject any or all bids.

Sioux Falls, S. D., this 16th day of December, 1913.

WALTER C. LEYSE,
City Auditor.

(Continued on Page 24.)

PROFESSIONAL DIRECTORY

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The Badger Architects, 916 Walnut st. will take bids Jan. 12, for a solid brick building, 2-story, 28x120, to contain store and 6 flats, for erection on Vliet st., owner's name withheld. The same architects have revised plans for the store and flat for J. Rosenburgh, to be erected on Clybourn st., owner's name withheld. To be 26x48, and cost \$5,500. Bids will be taken next week for remodeling a 2-family flat into a 4-family apartment of brick veneer construction. Bids opened next week for erecting a barn, 24x56, solid brick, to cost \$2,500; Max Holsman, owner.

Architects Herbst & Hufschmidt, Juneau Theater building, have awarded contracts on the S. G. & S. Realty Co. building in addition to those previously reported. Heating, Kaufman & Haas Heating Co.; electrical, Co-operative Electric Co.; painting, Wipking. The same architects have awarded contracts on the business building of the Alaska Land Co., Downer and Concord avs. Carpenter, C. Grellinger; mason, State Concrete Block Co.

Sealed proposals received by acting board of public works of West Allis until Saturday, Jan. 3, 2 p. m., for (1) construction and installing three new jail cells in city hall building, and remove, remodel and reinstall two old cells, check for \$100; (2) for labor and material required in constructing a new hose tower in city hall building; check for \$100: Geo. M. Leonard, John Lauer and Wm. Sharp, acting board.

Architects Siebert & Bruecker, 557 12th st., have awarded contracts on a 2-story brick veneer, 28x56, duplex flat, for Wm. Black, at 11th and Burleigh sts., general contractor, Henry Ranscht; sub-contracts: mason, Wm. Martin & Son; plaster, Margraff Bros.; sheet metal, Klubertanz Bros.; plumbing, Aug. Kroeger; painting and glass, Riverside Painting & Decorating Co.

Superintendent J. C. Pinney of bridges and public works, will be in charge of the work of erecting a natatorium in the 3d ward, Jackson and Huron sts., which is being planned by the city of Milwaukee for erection during the next summer. The common council is also considering the question of a public market and playgrounds at 9th and Forest Home avs.

Architects Leenhouts & Guthrie, 424 Jefferson st., have awarded contracts for erecting a frame duplex flat for H. J. Roemer on Chestnut st., between 32d and 33d sts., carpenter, Wierdsma & Laatsch; mason, Fred Tegge; plaster, F. W. Bauman; plumbing, L. Droese; painting and glass, Wm. Guenther.

Architects Klug & Smith, Mack building, have awarded contracts for the erection of a coal shed for the Gross Coal Co., Canal and 1st av. Concrete, Sterling Engineering Co.; steel and sheet metal, Worden-Allen Co.; roofing, Johns-Manville Co.; to be fireproof and cost approximately \$25,000.

Fred G. Simmons, commissioner public works, opened bids this week for the construction of a hand rail and walk on the coal trestle at the North Point pumping station, bond \$150; also for the labor and material required in constructing a fire escape and stand pipe in the city hall, bond of \$1,100.

A site, 80x150, at 8th and State sts., has been purchased by Mrs. E. T. Bradley for the site of the propose new shoe factory of the Bradley & Metcalf Shoe Co. A concrete and brick, five or six-story structure is contemplated; an option has been secured on adjoining property, 95x250.

Architects Leenhouts & Guthrie, 424 Jefferson st., have awarded contracts in addition to previous mentions on a duplex flat for E. M. Sprenger, 51st st., near Vliet st., plaster, F. W. Baumann; sheet metal, Klubertanz Bros.; heating, George Glassner; painting, Wm. Guenther.

Architects H. C. Koch & Son, Wells building, have awarded the mason and concrete work to Dunphy-Friedstin Construction Co., and electric wiring to Burdick Electric Co., on the Ticonic Investment light manufacturing building, 90x120, 4. story, reinforced concrete; cost \$75,000.

Architects Leiser & Holst, Germania block have completed plans for erecting the new Danish Lutheran church and school at Racine, Wis. To be of brick and stone construction, 1-story and basement, 40x100, and cost \$15,000; work will be started in spring.

The Milwaukee, Racine & Chicago Transportation Co. will erect the proposed warehouse, previously noted, on the dock site east of Broadway bridge, adjoining the Bradley & Metcalf Co. property. Work will be commenced in spring; cost \$50,000 or more.

El Wakodis Temple, Dramatic Order Knights of Korrassen, of the Knights of Pythias, will erect a modern temple if plans now under consideration materialize. A downtown location is being favored. Lawrence M. Jeger, Wells building, is royal vizier.

The West Allis Presbyterian congregation, 55th and National

al avs., has authorized George Gerlinger and other trustees to sell the present church and formulate plan for a \$10,000, brick and concrete church at 47th av. and Lapham st.

George W. Adams, Caswell block, has awarded contracts for remodeling a duplex flat at 2601 Cold Spring av. Carpenter, Etzel & Etzel; mason and cement, Huebner; sheet metal, Klubertanz; electrical, Oppitz; painting, Ed. Weize.

Architect H. J. Esser, Camp building, awarded brick and concrete warehouse, 2-story, 130x250, for Shadbolt & Boyd Iron Co., Wright and Bolton sts., general work to Wisconsin Cement & Construction Co., cost \$10,000.

Architect F. R. Crabtree has awarded the general contract for constructing a 4-story, reinforced concrete warehouse, for Hugo Deusterf, at 417 Prairie st., 75x100, to the Sterling Engineering & Construction Co., cost \$30,000.

The Raulf Co., contractors, Patton building, have secured a contract for the erection of a brick and concrete foundry building, 83x503, 1-story, for the Midland Malleable Iron Co., Ltd., Midland, Ont.; cost \$115,000.

Yunker Bros., 30th av. and S. Pierce st., have been awarded the masonry on a 2-family flat building, 24x46, on Layton blvd., near Maple st.; Henry W. Voelz is owner; Fred Voelz, carpenter contract; cost, \$4,500.

Architect F. W. Andree, Cawker building, has awarded additional contracts to those previously noted on residence for Mr. Kershaw, 49th and Grand av.; concrete, Wm. Coughlin; mason, A. J. Mikolajewski.

Architects Siebert & Bruecker, 557 12th st., are about ready for bids for a 4-family apartment, 24x50, of frame construction, with brick foundation, for erection of Cold Spring av.; owner's name withheld.

Otto Oestrich, 1484 Booth st., is erecting a 2-story and basement duplex flat, 24x42, costing \$3,000. F. H. Harder, 612 Greenfield av., is erecting a 1-story and basement cottage, 24x40, costing \$2,000.

Albert Damman, 207 17th st., is erecting a duplex flat, 24x44, 2-story and basement, on Burleigh st., between 33d and 34th sts.; general contract, Epanheimer Bros.; mason, State Concrete Block Co.

Robert P. Hanson Co. has been awarded the architectural, mason and carpenter work on 6 bungalows which are to be erected at 42d and Vliet sts., for Scranton Stockdale; each will cost \$3,600.

Architects Siebert & Bruecker, 557 12th st., are planning a 2-story, 27x55, store and flat building, of solid brick construction, to cost \$6,000; plans to mature in spring; owner's name withheld.

W. J. Isenring, 3415 Lisbon av. is having a bungalow erected at Whitefish Bay, to be of concrete block and frame construction; general contract, F. H. Garvens; hot water heating, K. Roberts.

Architects Martin Tullgren & Sons, 133 2d st., have awarded in addition to previously noted contract on store for A. Strauss, the electrical to City Electric Co.; glass, Pateck Bros.

Architects Siebert & Bruecker, 557 12th st., have awarded, in addition to previously noted contracts on office building for Dr. Wm. Gillespie, the carpenter work to Wm. Bently.

Architect Robert Schmitz, Berlin Arcade building, is taking bids this week on a residence, to be erected on Locust st., frame construction, brick basement, 26x44, costing \$3,500.

Architect George B. Ferry, 419 Broadway, has let the heating to Grassler & Gezelschap for the dance hall and store building at 78 Farwell av., in addition to previously reported.

R. J. Wussow is erecting five duplex flats in the vicinity of 35th and Cherry sts. One will cost \$4,900 and four \$5,200. Carpenter work let to L. Windish; masonry, Wm. Dallman.

Architect Leon M. Gurda, 920 2d av., will take bids after Jan. 12, for the construction of 2 duplex flats on Keefe av. to be 24x46 and cost \$3,500 each; Aug. Rebhan & Co., owners.

Architects R. A. Messmer & Bro., Majestic building, have awarded the general contract for addition to Heppe Cash Store at Hartford, Wis., to Thorn Bros., of Hartford.

Architect R. E. Oberts, 353 National av., has awarded on revised plans for the large stables and barn for Geo. Sheriffs the general contract to W. P. Madson.

L. H. Geisinger Co. is building a duplex flat on 29th st., between Hadley and Locust st., of frame and brick construction, 24x52, costing \$4,500.

B. A. Giesc, 1308 Richards st., is now ready for bids in the various building trades for the erection of two duplex flats on 52d st., to be 74x50.

A. C. Guetzkow, 185 13th av. is constructing a 1½-story bungalow, 30x53, with garage in rear, on Hi-Mount blvd., to cost \$6,000.

STATE WORK.

Bids will be received till 2 p. m., Jan. 15, for the Model School, State Normal School, Winona, Minn. See official advertisement in Improvement Bulletin this week.

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PROPOSAL ADVERTISING FOR BIDS.

STRUCTURAL WORK FOR NORTH WING AND THE NORTHEAST AND NORTHWEST CORNER PAVILIONS OF THE WIS- CONSIN STATE CAPITOL.

The Capitol Commission of Wisconsin invites proposals for furnishing the necessary labor and material for the structural work for the North Wing and the Northeast and Northwest corner Pavilions of the Wisconsin State Capitol now building at Madison, Wisconsin.

This work is to be executed in accordance with the plans and specifications prepared by George B. Post & Sons, Architects, and is to be done under their supervision and direction.

Plans and specifications for the work may be examined at the following places, viz:

The office of the Architects, 101 Park Avenue, New York.

The office of the Capitol Commission, new South Wing of the Capitol, Madison, Wisconsin.

The Builders' & Traders' Exchange, Milwaukee, Wisconsin.

The American Contractor, 180 N. Dearborn St., Chicago, Ill

The Improvement Bulletin, Lumber Exchange building, Minneapolis.

Plans may also be obtained for the individual use of prospective bidders by depositing with the undersigned a certified check of \$100.00, which check will be returned to the maker upon the return of the plans.

All proposals must be made on printed blanks and must be accompanied by a certified check (in amount of 5 per cent of the total proposal) which will, in case the proposition of the maker is accepted and he fails within ten days to execute a satisfactory contract and furnish a bond as provided by law, be forfeited.

Proposal blanks may be secured by application to the undersigned, to whom all proposals must be delivered, sealed

and properly endorsed, by Tuesday noon, Jan. 27, 1914.

Lewis F. Porter, secretary.
Capitol Commission of Wisconsin.
Madison, Wisconsin.

BOILER, PERHAM, MINN.

Sealed bids will be received by the Village Council of Perham, Minn., for one 72x18 boiler. Bids to be opened by the Council, January 12th at 8 P. M., 1914.

Right is reserved to reject any or all bids or to accept the one conforming to specifications which are on file with the Village Recorder.

PAUL MILLER,
Recorder.

BANK BUILDING.

Long Prairie, Minn.

The undersigned hereby gives notice that sealed proposals for the erection of building and bank fixtures and remodeling of banking room at Long Prairie, Minn., including all labor and material, will be received by The People's National Bank and the Reichert Improvement Co., of Long Prairie, Minn., until the hour of 2:30 P. M., on the 12th day of January, 1914.

All bids must be in strict accordance with the plans and specifications prepared by A. Moorman & Company of St. Paul, Minn., which may be seen at the office of Builders' Exchange, Minneapolis, Minn., on and after December 22, 1913, and may also be seen on application to People's National Bank, Long Prairie, Minn.

Make bids separate on Bank Fixtures, also on Banking Room.

A certified check for \$200, payable to the order of People's National Bank, must accompany each bid as a guaranty, the same to be returned to unsuccessful bidders immediately on letting the contract. The party to whom the contract is awarded will be required to give a satisfactory bond in the sum of \$3,000, for the faithful performance

of the contract. The right is reserved to reject any or all bids.

(Signed)
PEOPLE'S NATIONAL BANK,
Long Prairie, Minn.
By JOHN J. REICHERT,
Cashier.

Long Prairie, Minn.,
December 20, 1913.

NOTICE TO CONTRACTORS.

The board of education of Monticello, Iowa, will receive sealed bids for the labor and material necessary for the erection of a building to be used for a gymnasium and class rooms to be erected in accordance with plans and specifications to be furnished by said board. The building to be erected is estimated by the architect to cost \$10,000. Each bidder will be furnished with plans and specifications only after depositing with the secretary of said board, a certified check for \$10, payable to the order of the treasurer of the Independent School District of Monticello, Iowa, said check to be forfeited to said district in case the plans and specifications are not returned to the office of the secretary of said district before February 3, 1914, and upon the return of said plans and specifications said check shall be returned to the bidder depositing the same.

Bids will be received on the following.

1st. For the erection of the building complete, including the heating and plumbing.

2d. For the erection of said building complete, but without heating and plumbing.

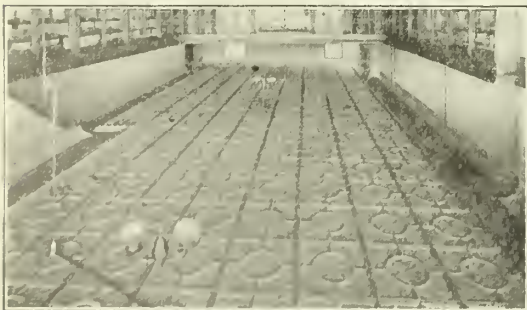
3d. For the installation of the heating and plumbing in said building.

Bids will be received up to noon of February 3, 1914, and will be opened at 2 p. m., February 3, 1914.

26w4

E. E. REED,
Secretary.

(Continued on page 26.)



SEND US YOUR PLANS
Our figures cost nothing, and
YOU WILL SAVE MONEY

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You Can Buy the Best Sheet Metal Work

such as Cornices, Steel Ceilings, Skylights,
Ventilators, Gutters, Ridgings, etc., etc.,

Right Here at Home—No Wait, No Worry

**ST. PAUL ROOFING, CORNICE
and Ornament Co.**
ST. PAUL, MINN.

HEAD OF THE LAKES

Office: 206 Manhattan Building. Telephone: Auto 3036.
Mail or telephone news not later than Wednesday.

DULUTH.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

P. Fosness, frame dwl., Morningside park.....	1,000
M. Grimsted, frame dwl., Morningside park.....	1,000
O. Hedberg, frame dwl., 39th av. W. near 6th st.....	1,500
St. Louis Co., brick garage, E. 2d st. near 6th st.....	1,500
M. Stayer, frame dwl., 95th av. W.....	1,500
Prettner & Skala, additions, New Duluth.....	1,000
W. J. Case, frame dwl., Faribault st. near Maxwell av.....	1,500
P. G. Payne, addition and stone foundation, E. 8th st. near 18th.....	1,500
O. Madison, frame dwl., Morningside park.....	1,000
F. M. Mirke, finishing dwl., Dodge st. near 51st.....	1,000

Announcement has been made within the past week that the Kelley-How-Thompson Hardware Co. had purchased 470 feet in the 5th av W. wholesale district, involving an approximate consideration of \$450,000; plans for a new warehouse will be made at once, it is said, and contracts let at an early date for the first unit of 100 feet of the 470 feet frontage. M. H. Kelley, president of the company, states that the action of the company in their heavy purchase was largely prompted by the interstate commerce commission's decision in the lake and rail case, placing Duluth on the same basis as Chicago.

With three business days remaining on the 1913 calendar, reports from the office of city building inspector showed that 1,480 permits, calling for construction work and improvements valued at \$4,002,236, had been issued since Jan. 1, 1913. This is an increase over the 1912 record of approximately 50 per cent, according to the city records, as the improvements and new building completed during the 12 months of 1912 were valued at \$2,680,548.

The West Duluth Commercial club has gone on record in favor of having the division of public works begin work to widen Jenswold st. between Superior and Oneota sts., near 33d av. W., instead of reopening the rock pile as was suggested a few days ago by Mayor Prince. Secretary Murray was instructed to send a communication to Commissioner Murchison, telling him of the action of the club.

The general contract for the M. S. Cook theater, now in course of erection on the site of the old St. James hotel, has been let to Fawcett & Bergstrom; estimated cost, complete, is \$75,000; work has already begun; Waghenstein & Giliuson, architects. Plumbing, heating, lihgtng and other contracts will be let in the near future.

In addition to the new warehouse to be built by the Kelley-How-Thomson Co., that deal will mean the ultimate building of a large warehouse by the Gowan-Lenning-Brown Co., on the property owned by it on Lake av. The premises now occupied by the grocery house are included in the sale just consummated.

SUPERIOR.

Announcement is made that the Eudestine Sisters at the House of the Good Shepherd, Central Park, contemplate the erection of a \$20,000 building in the spring. The improvement is made necessary by the crowding of the Wm. Pattison residence, which was purchased by the sisters and is now used as an orphanage. Improvements to the grounds will include a large high board fence which will be erected around the block. The order was established primarily to aid wayward girls and fallen women and the local institution expects to engage in this reformatory work just as soon as they have quarters in which to house the inmates. About 20 orphan children are now being cared for.

SEATTLE, WASH.

BUILDING PERMITS.

J. A. Doyle, 3908 W. Othello st., 1½-story residence.....	1,450
C. E. Gibson, 1208 E. 67th st., 1-story residence.....	2,500
Emory W. Ridgley, 4729 7th NE., 1-story residence.....	2,300
Whitman Hardware Co., 1921 1st av. S., 1-story frame.....	4,800
Peter Evenson, 5336 8th av. NE., 1½-story frame.....	1,400
R. A. Ellis, 4322 Burke av., 1½-story residence.....	2,600
C. Allen Dale, 813 2d av., alterations.....	3,000
Public Market & Department Store Co., 501-27 Pike place, alterations.....	1,450

FARGO, NO. DAK.

Mail or telephone news not later than Wednesday.

*Plans are being made for the location and construction of a new branch building by the Grand Union Tea Co., of New York, soon as site can be purchased; cost about \$20,000.

*A large warehouse will be erected here by the Northern

School Supply Co., as soon as an available site can be secured, contract to be let soon as site is choosen, 50x100.

*The Northwestern Telephone Co. bought the exchanges at Minnewauken, Leeds, Esmond, York, Dickey, Sanborn, Marion and Adrain.

*Fire damaged the home of A. S. Hogan.

OMAHA, NEB.

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

W. R. Dalbey, 2822 N. 19th av., frame dwl.....	2,000
Skinner Mfg. Co., 1202-04 Jackson st., repairs.....	1,400
P. C. Cramer, 3821 N. 18th st., frame dwl.....	2,000
Omaha Club, 2006-8 N. 18th st., addition.....	5,000
Nat Meister, 3425 Boyd, frame dwl.....	1,500
W. T. Gagnebin, 1503 N. 40th, frame dwl.....	3,500

DES MOINES, IOWA

Bert N. Mills, Representative, 310 Hubbell Building.

Za-Ga-Zig Temple, the local organization of the Mystic Shrine, plans to reverse its recent action to defer the building of its proposed new temple until a later date. Committees now are at work to get the building started this year. It is planned to model the structure after a similar temple at Dallas, Texas, or along the same lines as that of the great Shrine temple in Washington, D. C. Architects are to be called in from other cities to confer with the Shriners. It is planned to secure, if possible, the advice of architects who planned a similar building at Topeka, Kan. Earl C. Mills, past grand potentate of the temple is prominent in the preliminary work.

The Flint Brick Co., the Barber Asphalt Co. and the Shackelford Brick Co., all of Des Moines, have secured the contracts to furnish all of the brick to be used for platforms, freight house floorings, and stock pen floorings along the entire Pacific Coast extension of the Milwaukee lines from the Missouri river at Mobridge to the Pacific Coast. The order is for 80 0carloads of brick.

A. H. Blank announces that soon after Jan. 1, he will be prepared to start work on the remodeling of the Iowa Seed Co. store on W. Locust st. The sum of \$50,000 is to be spent to make this location the site of the finest moving picture theater in Iowa; Mr. Blank says he opened a new theater at Davenport this week that cost \$30,000; it is called the Casino.

Dr. C. E. Ruth, of Des Moines announces that he will build a \$20,000 home next spring on a lot at 27th and Forest drive which he has just purchased from the Urick estate for \$3,500.

GARAGES AND BARNs

Notes Arranged Alphabetically by States.

Iowa, Albert City—Olof Nelson is building a modern garage.

Iowa, Des Moines—E. W. Brown will erect a garage, work to start soon.

Iowa, Grinnell—Grinnell Aeroplane Co., capital \$10,000; D. S. Morrison and others.

Iowa, Marshalltown—Auto Sales Co., capital \$10,000; W. L. Topf, president.

Iowa, Stockport—Ed. Decker will rebuild barn recently burned, 35x50, milled roof, modern.

Iowa, Tabor—C. E. Jones Lumber Co., capital \$15,000.

Iowa, Washington—Jesse Phillips is erecting a new garage.

Minn., Beardsley—The barn of Jas. Flood was burned.

Minn., Brewster—Fire destroyed the barn of Wm. Lebben, on the Middlested farm; loss about \$2,000.

Minn., Grand Rapids—The garage under construction by A. L. Wellein nearing completion.

Minn., Hutchinson—Work is progressing rapidly on the DeLong & Peterson garage.

Minn., Kellogg—Fire burned the barn of W. H. Garner; loss about \$3,500, insured \$500.

Minn., Olivia—Olaf Bohman built a barn for Simon Vickstrom, 52x60.

Minn., Shelly—Redland & Ueland have commenced work on their new garage, frame construction.

Minn., Thief River Falls—Fred Haug will erect a large garage, 140x50 next spring, modern.

Minn., Wabasha—Chas. F. Gilberts will build a large modern garage in the spring, 3,000 feet floor space.

**Employers' Liability Insurance
Surety and Fidelity Bonds.**

FRED L. GRAY COMPANY

THE LARGEST AGENCY OF ITS KIND
IN THE NORTHWEST

More than 50,000 personal
injury cases handled for
contractors and others
since 1892.

Security Bank Bldg.,

MINNEAPOLIS

PROPOSAL ADVERTISING FOR BIDS

MODEL SCHOOL.

State Normal School, Winona, Minn.
OFFICE OF C. H. JOHNSTON, ARCH-
ITECT, 715 CAPITAL BANK BLDG.,
ST. PAUL, MINNESOTA.

Sealed proposals will be received by
State Board of Control in their office in
the State Capitol Building, at St. Paul,
Minnesota, until 2 P. M., Jan. 15th
(Thursday) for the erection and com-
pletion of the Model School Building at
the State Normal School, Winona,
Minn., including the general contract
work, heating and ventilating, plumbing
and electrical work, in accordance with
plans and specifications furnished by
C. H. Johnston, Architect, 715 Capital
Bank Building, St. Paul, Minn. Bids
will be received collectively and sepa-
rately. Bids to be submitted only on

form of bid supplied by the Architect;
no other form will be considered. Bids
to be accompanied by a certified check
for 4 per cent of the amount of the bid,
payable to the Minnesota State Board
of Control, which check will be re-
turned when building contract is exe-
cuted.

Copies of above plans and specifica-
tions may be seen at Builders' Exchang-
es in St. Paul and Minneapolis, Minn.,
at the Pres. office of the above insti-
tution and at the office of the State
Board of Control, State Capitol Build-
ing, St. Paul, Minn.

Extra copies of the plans and speci-
fications may be obtained on applica-
tion to the architect on payment of cost
of duplication. Successful bidders
must furnish the Board with a surety

company bond in 75 per cent of the
amount of contract. The right is re-
served to accept or reject any or all
bids.

CHURCH. Huron, S. D.

The undersigned will receive sealed
proposals for the erection of a church
building for St. Martin's Roman Catho-
lic church at Huron, S. D., until Jan.
31, 2 p. m.

All bids must be in strict accordance
with the plans and specifications pre-
pared by the architect, E. L. Masqueray,
St. Paul, Minn., which may be seen at
the office of Builders' Exchange, St.
Paul, Minn., on and after December 30,
1913, and also at the architect's office.

The party to whom the contract is
awarded will be required to give a sat-
isfactory bond for the faithful perform-
ance of the contract. The right is re-
served to reject any or all bids.

REV. D. F. DESMOND, Rector,
St. Martin's Church,
Huron, S. D.

WANT ADS SPECIAL NOTICES

NOTICES under this heading will be in-
serted at the rate of fifteen cents per line,
each insertion; no notice inserted for less
than 50 cents.

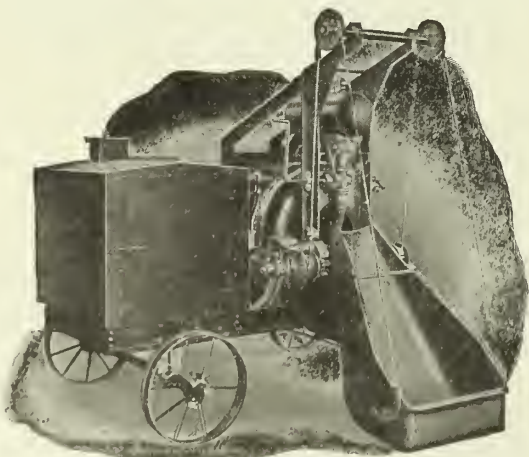
FOR SALE—GAS ENGINE.

"For Sale—Gas Engine, 16 H. P. Sta-
tionary, friction clutch pulley, magneto;
A-1 condition, about half price. Can be
seen at 414 1st st. N.

PORT HURON MACHINERY CO.,
Minneapolis."

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the Importance of Thorough and Rapid Mixing, and
the Durability of the Mixer.



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The Elevating Charging Bucket is the most efficient.
Common Sense Construction and strongest built
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N. W. Branch Office, H. B. Jones, Dist. Mgr.,
350-352 Security Bank Bldg. Minneapolis

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Are you reading
this advertising of
Atlas Portland Cement?
Begin to watch
for it — inside of
a month you'll
be glad you did.



The Quality Mark

STREET AND ROAD WORK

Notes Arranged Alphabetically by States.

Ariz., Clifton—Bids received by A. L. Terry, clerk, until 10 a. m., Jan. 5, for graveling the Duncan-Richmond road four inches thick, 12 feet wide; check for 10 per cent.

Ariz., Florence—Bids received by Chas. R. Osborn, secretary of the board of control, at Florence, until 2.10 p. m., Jan. 16, for 400 barrels of cement for the prison; check for 5 per cent.

Ariz., Yuma—Bids received by supervisors of Yuma county until 10 a. m., Jan. 10, for furnishing equipment and labor for the improvement of public highways, estimated to cost \$500,000; check for 5 per cent; plans with Roy Hansberger, clerk.

Ark., Star City—Bids received by Will McGehee, secretary of Lincoln county road district No. 1, until 2 p. m., Jan. 2, for complete construction of about 13 miles of improved roadway; check for \$250.

B. C., Point Grey—Intersections of certain streets ordered macadamized.

B. C., South Vancouver—It is announced by Reeve Kerr that some important municipal work will be undertaken at once, including the Main st. paving.

Iowa, Clinton—Hearing Jan. 13, on the improvement of 9th av.; four kinds of paving considered; Frank W. Leedham, city clerk.

Iowa, Clinton—A resolution is being published providing that 10th av, from a line 12 feet east of the west line of 4th st. to the west line of 8th st., including all returns at intersections to the property lines extended, shall be graded, curbed and guttered. The council proposes to advertise for and receive bids upon four kinds of paving, namely: vitrified block paving, creosoted wood block, concrete paving with a bituminous top-coat and asphaltic concrete paving; Frank E. Leedham, city clerk.

Iowa, Council Bluffs—Petitions are to be circulated among farmers for the city council to pave South av. to the city limits; address city clerk.

Iowa, Creston—Union county supervisors voted to improve the N. Cherry st. extension east into the country by grading and either graveling, concreting or paving with brick.

Iowa, Keokuk—City council will order a pavement of brick block placed on Commercial alley from the east line of E st. to the west line of B st., Reid's addition, including two intersections, the width to be 29 feet between the curbing; brick block paving will also be placed on so much of B st. and the intersection of Commercial alley with B st. as will be necessary to connect the pavement on Commercial alley with the pavement on 5th st.; address city clerk.

Iowa, Le Mars—Plans and specifications furnished by city engineer K. C. Gaynor for the proposed paving on S. Main st. received and accepted by council. Main st. will be paved from 4th st., joining the paving now in use and 6 blocks will be paved to Broadway. It is expected that petitions for paving on Eagle and Clark st. will shortly be presented and a large amount of paving will be done next spring.

Iowa, Leon—City council has acted favorably on petitions for 55 blocks of paving and resolutions of necessity will be required are brick, asphaltic concrete and bitulithic; address city clerk.

Iowa, Monticello—Bids for paving will be received next month; M. Tschirgi, engineer, Cedar Rapids, Iowa.

Iowa, Nevada City—Council plans installation of 23 blocks of concrete paving in 1914; address city clerk.

Iowa, Ottumwa—City commission has adopted plat and schedule for paving on Church and S. Market sts; J. T. Brady, city engineer.

Iowa, Pella—The Commercial club is agitating the building of a concrete highway to the Des Moines river bridge with the hope that it may later be built to Knoxville; a committee will be appointed to ascertain the probable cost of the road and see about financing the proposition.

Iowa, Sac City—Hearing Jan. 19 on paving on Main st., 5th st., Leonard st. and 8th st., paving to be of either sheet asphalt, asphaltic concrete, brick block, concrete, bitulithic or dollarway, the same to be placed on a 5-inch concrete base; also, curbing of Portland cement; W. F. Weary, city clerk.

Iowa, Schaller—The subject of paving is being discussed.

Iowa, Storm Lake—The Commercial club has passed resolutions for the paving of the business section of the city; address city clerk.

Iowa, West Union—Bids to be received next month for paving; M. Tschirgi & Son, Cedar Rapids, Iowa.

Kan., Clay Center—A bond issue of \$200,000 is proposed for good roads in Clay county.

Kan., Topeka—Petitions presented to city commission for 64 blocks of street paving during 1914; address city clerk.

Man., Tuxedo—Town council has published a list of the streets it intends paving with cement; T. D. Whiting, city clerk.

Minn., Bemidji—Bids received by J. L. George, county auditor, until 2:30 p. m., Jan. 6, for grubbing and clearing county road No. 55, according to plans; check for 10 per cent.

Minn., Blue Earth—Bids received by C. L. Kennedy, county auditor, until 2 p. m., Jan. 15, for the improvement of the road on the Le Sueur county line just west of Lake Washington; the work will require approximately 57,200 square feet of willow mat, approximately 4,000 cubic yards of earth fill and eight 12-foot 28-inch corrugated metal culverts; check for 10 per cent.

Minn., Carlton—State highway engineer O. L. Dent advises that the final hearing on state rural highway No. 11, Carlton county, will be held Jan. 15.

***Minn., Minneapolis**—The annual report of Frank Haycock, county surveyor, shows that the following roads have been macadamized at the cost stated: Osseo road, 98.4 of a mile at \$4,606, or \$4,681 per mile; Osseo and Champlain road, 2.57 miles, for \$3,658 or \$1,423 per mile; River road, 2.38 miles, \$9,043 or \$3,786 per mile; Crystal Lake hill, .7 of a mile for \$3,383 or \$4,733 per mile. The Superior blvd. was built of concrete for one mile at a cost of \$10,137, while 3.8 miles were treated with bitulithic pavement at a cost of \$50,000 or \$13,157 per mile. The average cost of four roads totaling 6.42 miles was \$3,115 per mile. The average cost of grading 17.74 miles was \$3,617 and the average price of graveling 27.59 miles was \$1,370.

Minn., St. Cloud—Petition from property owners on 2d av, S. for sidewalks, water mains and curbs on 2d av. S. between 7th and 8th sts. and that the avenue be graded between 7th and 9th sts. S. G. G. Magnuson, city clerk.

Mo., Festus—About 1,000 square yards of brick pavement is under consideration; Hiram and C. F. Phillips, International Life building, St. Louis, Mo., engineers.

Mont., Great Falls—Hearing Jan. 12, on the improvement of 2d alley north; W. H. Harrison, city clerk.

Mont., Great Falls—Bids received by W. H. Harrison, city clerk, until 8 p. m., Jan. 19, for concrete curbing and sidewalks for the year 1914, as shown on plans and specifications filed in the city clerk's office; check for 10 per cent.

Mont., Great Falls—The Cascade county good roads association is behind a proposition proposing a bond issue of \$250,000 for improvement of roads in this county.

Mont., Missoula—Bids received by City Clerk Smith until Jan. 14 for paving Main st. from Pattee to Woody; plans will be prepared by City Engineer Buck.

Neb., Falls City—There is talk of paving various alleys and additional streets this year; address city clerk.

Neb., Nebraska City—Preliminary plans for seven blocks of paving in North 10th st. are being prepared by C. A. Shannon, city engineer; probably brick; M. C. Beery, city clerk.

Neb., Omaha—Ordinance being published for improving part of Charles st. by paving and curbing and directing city clerk to advertise for bids on asphalt, stone, vitrified brick, vitrified brick block, artificial stone, macadam, creosoted wood block, asphaltic concrete and vertical fibre brick; also for improving part of 26th st. by paving and curbing and directing city clerk to advertise for bids; also for improving part of Spencer st. by paving and curbing, and directing city clerk to advertise for bids; Thomas J. Flynn, city clerk.

Ore., Albany—Property owners on 9th st. want that street paved with bitulithic.

Ore., Grants Pass—Election Dec. 31, to vote on issuing bonds for \$225,000 for roads in Josephine county; address county clerk.

S. D., Britton—Bids received by Homer M. Deer, state engineer, till 2 p. m., Feb. 2, for building highway beginning 8 miles east of Britton and continuing for a distance of 13 miles across the old military reservation, work to be completed by June 10, 1914. Bids to be at so much per cubic yard on from 10,000 to 12,000 cubic yards; plans, estimates, specifications, etc., may be seen at the office of Samuel Denton, deputy state surveyor, Britton, S. D.

Texas, Gainesville—An election is proposed to vote on bonds for \$200,000 for good roads.

Texas, El Paso—Election to be held Jan. 24, to vote on \$100,000 bond issue for road work.

Texas, McKinney—Bonds in the sum of \$450,000 have been voted to build 90 miles of macadam roads diverging in every direction from McKinney; 14 miles of these roads will be a portion of the Oklahoma, Texas and Gulf highway.

Wash., Auburn—Preliminary work on surveying of county road between here and Enumclaw has been started by an engineering crew from Seattle.

Wash., Colfax—Survey for the permanent highway from Pullman toward Staley, about 3½ miles, is under way by J. H. Miller, county engineer and assistants; bids will be called for in the spring.

KEEP TALKING---LINO FELT--*"Between you and the weather"*

If the cold of winter prevents you working on the outside, there is still time to save your customer money on his fuel bill by putting LINO FELT between or over the studding. This is **inside** information. Talk to him about putting LINO FELT in the walls and roof of his home not only because he can save fuel in winter, but because LINO FELT keeps the heat out in summer, and the sound waves stop when they meet LINO FELT, insuring Comfort the year around.

UNION FIBRE COMPANY, --: WINONA, MINNESOTA

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Indianapolis--20 Illinois Trust Bldg.
San Francisco--445-47 Turk St
Milwaukee--Stroh Bldg.

New York--507 W. Broadway
New Orleans 904 Hennen Bldg
Philadelphia 411 Walnut St.
Detroit--Builders' Exchange
Los Angeles--928 S. Main St.
Rochester--38 Exchange St.
Dallas--Builders' Exchange



Gopher Traction Ditcher

THE MOST PRACTICAL MACHINE FOR DIGGING IRRIGATION OR DRAINAGE DITCHES

Travels under own power on three large caterpillars having 100 square feet of bearing surface on the soil.

Weight per square foot on the ground is 23 per cent less than the weight under the average man's foot.

Will sustain its weight in the softest marshes, turn a right angle, go forward or back, climb a 25 per cent grade, load on car with own power, and is not too wide to cross country highway bridges.

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4-Cylinder Engine 24 Foot Boom
Caterpillar Tractors 1 Yard Dipper

Stump Puller

--: Electric Light with Auxiliary Engine --:

Two Machines Ready For Immediate Delivery
If this is interesting write to us for further particulars

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MURPHY

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Wash., Ephrata—County commissioners have voted to expend \$20,000 on paving road from here to Soap lake.

Wash., Seattle—Plans and specifications have been approved by board public works for paving alley in block 28, A. A. Denny's addition, at a cost of about \$20,000; repaving Pike st., at a cost of \$25,000; grading and planking Southlake av., at \$71,000, and constructing concrete walks on N. and W. 76th st., at \$14,000.

Wis., Kaukauna—Bids received by L. C. Wolf, city clerk, until 4 p. m., Jan. 6, for cement curbing in South road district.

Wis., Kenosha—County board has ordered curb and some new sidewalk for the court house; Russell H. Jones, county clerk.

Wis., Lake Geneva—Council has voted to pave 6 blocks next spring with creosoted blocks; address c iytclerk.

Wis., Mondovi—City council has decided to build a half a mile of concrete road beginning at the east line of the city of Mondovi and the east end of Main st. thence west along the center of Main st. ½-mile; C. E. Otis, mayor.

Wis., Sheboygan—Bids will be received in the spring by J. M. Steimle, city clerk, for paving portions of various sts.

Wis., Superior—Program for road work in Douglas county for 1914 has been completed and highway commissioner ordered to prepare plans and specifications and prepare to let contracts as early in the spring as funds shall be available. The work included in the road commissioners' estimates are as follows: Grand av. grading and macadam, \$15,500; Lake-side road, grading and draining, \$5,000; Spaulding av., grading and draining, \$5,000; Poplar road, concrete bridge and draining, \$2,000; Maple road, improvements, \$1,500; Nebagamon road, improvements, \$6,000; Winnebijou road, improvements, \$2,500; Highland roads, improvements, \$1,500; Central state road, \$2,000; Tower av., \$14,000; Bardon av., grading and concrete bridge, \$4,200; Black River road, improvements, including bridge, \$6,500; Rossiter road, improvements and two small bridges, \$2,500; Wm. J. Leader, county clerk.

Wisconsin—Road machinery will be purchased by various counties of the state as follows: Waupaca county—Sum of \$4,000 appropriated to buy a roller, small graders, scrapers, etc.; address A. R. Potts, Waupaca; St. Croix county—20 wheelers and 6 road plows to be bought, \$2,000 appropriated; C. E. Holden, Burkhardt, Barron county—Wants 15 No. 2 wheelers and other small machinery; S. S. Berg, Rice Lake, route 5. Pepin county—Purchase recommended of sprinkler wagon; G. A. Goss, Durand. Dunn county—\$1,400 appropriated and will trade 10-ton roller for various machinery; C. B. Bird, Wheeler, route 2. Wood county—\$3,360 appropriated for wheelers, scrapers, camping outfits, graders, etc.; Hy. Ebbe, Marshfield, R. 1. Dodge county—\$3,000 appropriated for road machinery; J. T. Carroll, Juneau. Richmond county will probably buy one rock drill, one 10-ton roller, two crushers; G. H. Mainwaring, Gotham. Price county—\$2,000 appropriated for road machinery; J. B. Saunders, Park Falls. Chippewa county—May buy a crusher and some wheelers; further action March 17; W. Woodward, Blomer, La Crosse county—\$2,000 appropriated for wheel scrapers and truck wagons; John Hatz, Bangor, route 2, on Sheboygan county—Will buy roller, scrapers, grader and smaller tools; John Ingelse, Adell. Ozaukee county—Will buy, but not before February, a crusher, roller, some cheelers, one or two graders and plows; John Armbruster, Cedarburg. Waukesha county—\$8,000 appropriated for machinery and tools; W. C. Jones, Pewaukee. Manitowoc county—Will buy crusher and possibly some small machinery, for which \$3,000 has been appropriated; Wm. Brandt, 711 Buffalo st., Manitowoc.

CONTRACTS AWARDED.

Ariz., Tuscon—Contract for paying on Congress st. awarded to Arizona Asphalt Paving Co., Phoenix, for \$62,440; the work includes grading, bitulithic paving, concrete curbs, gutters and culverts, vitrified sewer, 3 man holes, flush tanks and lamp holes.

Ore., Portland—Contract to Warren Construction Co. for paving Broad st., at \$10,530.

Ore., Portland—Contracts have been made with Cochran, Nutting & Co., for grading and concrete curbs and walks on 54th st., southeast at \$1,327; also, on another portion of the same street, at \$1,344; also for improving 53d st. at \$1,520.

Texas, El Paso—Contract to the Southwestern Construction Co. for paving Copper st. in Manhattan Heights; work will cost about \$10,000, and will begin at once.

Wash., Olympia—Contract with the Mohr Construction Co., Waterville, for 7½ miles of the Sunset highway from Waterville west toward Wenatchee, at \$19,558; the Wenatchee end of the highway has already been awarded. The contract for the Pacific highway work in Lewis county has been let at \$12,500.

Wis., Green Bay—Contract to Henry Laundry for 150 cords of stone at \$2.50 per cord; Frank Kuipers awarded contract for 150 cords at \$2.20; contract to George Elliott for 150 cords at \$2.24.

BRIDGES

Notes Arranged Alphabetically by States.

B. C., Vancouver—Plans have been approved for construction of viaduct across tracks of G. N. road; A. H. Hoagland, chief engineer, St. Paul, Minn.; cost \$500,000; H. H. Stevens, engineer for dominion government has plans for a steel bridge on False Creek to connect with main land; cost \$400,000.

Mich., Grand Rapids—Plans have been completed by city engineer for concrete bridge on Pearl st., estimated cost \$138,000. Bond issue for same will be submitted at April election; contract for Leonard st. bridge let to Hackedorn Contracting Co., Indianapolis, Ind., at \$77,777.

Idaho, Twin Falls—The state highway commission at Boise has ordered plans prepared for construction of a wagon bridge over Snake river above Sheshone Falls. It will have four 100-foot spans.

Iowa, Charles City—Bids received until 12 noon, Jan. 7, by H. B. Rosenkrans, county auditor, for construction of bridges and culverts in the county; G. H. Elliot, county engineer.

Minn., Duluth—Bids received by O. Halden, county auditor, till 2 p. m., Jan. 6, for furnishing and erecting a steel bridge over St. Louis river, furnishing and erecting steel bridge over Stony brook on the Duff road, separate bids on each job; check for each for 10 per cent.

Minn., Luverne—A petition was presented by the town of Battle Plain asking for aid in the construction of a bridge between sections 24 and 25 town of Martin asked for \$700 to aid in construction of bridge between section 22 and 27; John Kelly, county auditor.

Minn., Luverne—Bids will be received by county auditor's office, 1 p. m., Jan. 19, for construction of reinforced concrete slab span bridge, 20-foot, 18-foot roadway in township of Battle Plain; check for 5 per cent; P. S. Hoime, chairman, John Kelly, county auditor.

Minn., Minneapolis—City Engineer Cappelen has been instructed to draw preliminary plans and to submit estimate of cost at next meeting of council for a concrete bridge at 19th av. to be a duplicate of the proposed 3d av. bridge.

Minn., Sauk Rapids—A. H. Turriton and J. H. Coates has applied to the state highway commission to investigate the superstructure of the Sauk Rapids bridge and give orders as to repairing it. Bridge has been out of repair for some time but either the county or village will spend the money to repair it.

Minn., Staples—The town of Becker voted \$1,000 worth of bonds to assist in building a bridge across the Crow Wing river on the tri-county line near Ed. Cook's place.

Minn., Thief River Falls—Board of county commissioners has allowed \$4,000 on Squaw Point bridge and \$1,000 for approach.

Minn., Thief River Falls—Contract has been let for railroad bridge across Thief River.

Minn., Warren—Bids received by A. G. Lundgren, county auditor, Jan. 16, 11 a. m., for two combination steel and wooden bridges over the main ditch of judicial ditch No. 11, one to be 40 feet and one 60 feet, and all other bridge work that will be required on said system or that may be ordered by engineer in charge; check for \$1,000; W. R. Hoag, Thief River Falls, engineer.

Mont., Glasgow—Valley county commissioners have instructed county supervisor to report as to the kind and size of bridges across Cherry creek, and one across Brazil creek.

Wash., Seattle—The Sound Construction Co. were awarded contract to build four bridges for the N. P. road on the University campus; cost \$80,000.

Wash., Tacoma—Oregon Washington Railroad & Navigation Co., J. R. Holman, chief engineer, have begun preliminary plans for a steel bridge across the city waterway at 15th st. Bids will be taken in January; cost \$365,000.

Wash., Tacoma—Contract for 15th st. and 21st st. viaducts to be erected by the N. P. road has been let to the Widell Co., Mankato, Minn., at \$250,000; work to begin at once; C. A. Cook, engineer for railroad.

Wis., Chippewa Falls—Work has started on the Soo Line bridge across Chippewa river.

Wis., Clintonville—Small bridges will be built in towns of Bear Creek, Helvetia, Matteson and Union, write Chas. J. Knudson, route 4.

Wis., Fond du Lac—Vulcan Iron Works, this city, have contract to erect the 80-foot bridge over Paint Creek on the south trunk line at \$3,585.

Wis., Green Bay—Council is preparing to take bids in February for building bridge over the Fox at Mason st. Bonds for \$170,000 will be issued.

Wis., Kewaunee—Jos. G. Walecka, clerk will receive bids Jan. 5, 1 p. m., for 150 feet span, concrete floor, steel bridge.

Wis., Ladysmith—Rusk county will build bridges in towns

of Atlanta, Grant, two in Willard; H. W. True, county highway com.

Wis., Melrose—Bridges will be built next year in towns of Alma and Albion; write A. D. Polleys, county highway commissioner; Engineers, state highway commission, Madison.

Wis., Neillville—Bridges will be built in the towns of Weston, Sherman, Green Grove and probably some others. W. C. Thoma, county highway commissioner.

Wis., Prairie du Sac—State bridge engineer has prepared plans for a steel bridge to be erected over Wisconsin river, 1,400 feet long reinforced concrete floor; cost \$70,000; W. Torkelson, engineer, Madison, Wis.

Wis., Sheboygan—A number of bridges in county in 1914; address John Ingelse, Adell, Wis., chairman.

Wis., Stockholm—About \$1,000 will be spent on small culverts in 1914, write O. K. Anderson, chairman.

Wis., Wilton—Bridge will be built in town of Wellington; cost \$3,000; Wm. Schindler, town chairman.

CONTRACTS AWARDED.

Minn., Dexter—Contract for waterworks let to National Co., South Bend, Ind.

S. D., Howard—Platt Iron Works received contract to furnish a pump for the water works plant.

Wash., Seattle—Contract for water mains on Surber av. let to V. Ramaglia at \$6,650.

Wis., Superior—Contract for a 25,000-gallon steel water tank and tower for workhouse farm awarded to the Lakeside Bridge & Tank Co., at \$2,311.

SEWERS

Notes Arranged Alphabetically by States.

Alta., Medicine Hat—Council has voted \$60,000 for surface and storm sewers; A. K. Grimmer, city clerk.

Ariz., Phoenix—F. M. Holmquist, city engineer, urges expenditure of from \$2,000,000 to \$3,000,000 for a new drainage system.

B. C., Vernon—Plans involving additions to the city's sewer system, mains, disposal works, etc., have been submitted by Cummins & Agnew, consulting engineer; cost about \$90,000.

Iowa, Alden—Bids received in February for sewer work; M. Tschirgi & Son, engineers, Cedar Rapids.

Iowa, Clarion—Plans for the proposed sewer system have been completed by C. H. Currie, engineer, Webster City, Iowa; plans include septic tank, and total cost will be around \$40,000.

Iowa, Davenport—Bids for sewer construction will be opened by Hugo Moeller, city clerk, on Jan. 7; there are two contracts.

Iowa, Greene—Bids received in February for constructing sewers; M. Tschirgi & Son, Cedar Rapids, engineers.

Iowa, Grinnell—Plans for the sewer work and disposal plant are being prepared by T. L. Black, city, and contracts will be let this winter; A. C. Harriman, city clerk.

Iowa, Moulton—Council is having plans and specifications made for a sewer system; address city clerk.

Iowa, Osage—Sealed bids now coming in from a number of engineers for the surveying of the city for the proposed sewer system; address city clerk.

Iowa, Sioux City—Plans for a sewer system to cover a territory over three miles in area west of Peters' park and Morningside av. are to be drawn at once by city engineer, Fred. Smith. It is probable a request for concrete paving will follow.

Kan., Fort Scott—Bids received by G. N. Sanford, city clerk, until 5 p. m., Jan. 6, for sewer extension No. 7 to sewer district No. 7.

Kan., Topeka—City commission has approved the west side sewer system, to be built this year at an estimated cost of \$100,000, and to include Melrose, Lowman Hill, the west end of Elmhurst and College Hill additions.

Minn., St. Paul—Bids received by Leonard C. Seamer, clerk of the board of public works, until 2 p. m., Jan. 8, for a sewer on James st.; check for 10 per cent.

Mo., St. Louis—The issuance of bonds for \$4,000,000 and the purchase of property and straightening the river des Peres is recommended by C. Moreno, sewer commissioner.

Mo., St. Louis—Chas. A. Moreno, sewer commissioner, has asked for \$3,200,000 for various sewer needs, \$2,000,000 being to replace worn out and dangerous sewers in the downtown district.

Mont., Fort Benton—Plans and specifications for the proposed sewer system here have been approved by the council and it is expected that work will start early in the spring.

Neb., Bancroft—Bids received by C. E. Barnes, village clerk, until 8 p. m., Jan. 19, for a sewer to cost about \$20,000; check for \$500; Towle Engineering Co., 1123 City National Bank building, Omaha, Neb.

Neb., Lincoln—Bids received by Theo. H. Berg, city clerk, until 2 p. m., Jan. 8, for a reinforced concrete conduit approxi-

mately 942 feet long, in accordance with plans, cost of which is estimated at \$42,388; Kent D. Cunningham is secretary of the sanitary board.

Neb., Scottsbluff—Bids received by G. L. Shumway, city clerk, until 6 p. m., Jan. 15, for sewer laterals for sewer district No. 1; plans by Yoder & Liljenstolpe, city; check for \$500; estimated cost is \$22,500, and the work includes 3,110 feet 10-inch pipe and 15,520 feet 8-inch.

N. D., Grand Forks—Plans have been made by H. G. Lykken, city engineer, for a drain in the south end to be laid next summer; will be over a mile long.

N. D., Park River—Steps for the installation of a complete sewer system have been taken and plans now being prepared; address city clerk.

Ore., Hood River—City engineer instructed to prepare plans and specifications for sewers for the Hill district; will be a septic tank and filter proposition.

Ore., Portland—Low bidders on various sewer propositions were K. Y. Azar for sewers in Albina st., at \$1,760; Dennis & Christensen for sewers in Ogden av. at \$818; same for sewers in Georgian place at \$571; K. Y. Azar for sewers in E. Main st. at \$1,081.

S. D., Yankton—Bids received by John W. Summers, city auditor, until 7:30 p. m., Jan. 5, for a lateral sewer along the alley north and south through block No. 4.

Texas, Dallas—J. H. Fuertes, engineer, says it will require \$750,000 to construct a modern sewage disposal plant according to his plans. The city commission hopes that the bonds can be sold so that actual construction work may be begun next spring.

CONTRACTS AWARDED.

Iowa, Bloomfield—Contract let to Tschirgi & Son, Cedar Rapids, for laying 4,600 feet of sewer pipe.

Iowa, Cedar Rapids—Contract for sewers to be installed here awarded to M. Tschirgi & Sons, city, at 36 cents per lineal foot.

Neb., McCook—Contract for a septic tank for the sewer has been let to the McCook Cement Stone Co.

DRAINAGE AND IRRIGATION

Notes Arranged Alphabetically by States.

Iowa, Algona—Bids will be received until Jan. 7, 3 p. m., for ditches and drains, district 96, Kossuth county. B. E. Norton, auditor.

Iowa, Cedar Rapids—Estimated cost of Cedar River dam, concrete, at Cedar Rapids, \$13,000.

Iowa, Indianola—Bids are being taken until 1:30 p. m., Jan. 13, for constructing drainage ditch 1, 12 miles long; plans may be had from Thomas Darnell, county auditor; A. S. Van Sandt, engineer.

Iowa, Muscatine—Harmon & Co., Peoria, in charge of engineering work drainage district 13, are expected to announce result of bids soon.

Iowa, Newton—Hearing on proposed Skunk river drainage ditch has been set by county board for Feb. 19.

Minn., Baudette—President Williams, board of trade received word that government would spend \$2,157 to improve the harbor as far as Spooner bridge.

Minn., Detroit—Bids received until 2 p. m., Jan. 22, for digging and construction of ditch 12, Becker county; 55,143 cubic yards excavation; estimated cost \$7,165; W. J. Morrel, county auditor.

Minn., Montevideo—Hearing 10 a. m., Jan. 14th on proposed ditch 15; J. J. Stennes, county auditor.

Minn., Roseau—Final payment to Kohler Constructing Co. on county ditch 11 ordered made.

Minn., Stillwater—Hearing 10 a. m., Jan. 26, on petition for public ditch in Washington and Anoka counties, by Wm. Lavelle and others. David A. Connor, clerk district court, Washington county, Stillwater.

Minn., Thief River Falls—Final hearing judicial ditch 40, announced for Dec. 17, was postponed; estimates on another route ordered on account of opposition in town of Gervais; new route will require removal of 70,000 yards; original route, 52,000.

Minn., Virginia—A large ditch will be excavated around O'Brien Lake near Hawkins Mine for purifying water going into Swan lake.

Minn., Windom—Bids received 1:30 p. m., Jan. 15, for construction of judicial ditch 5, 9,100 feet 8-inch tile, 1,700 feet 10-inch, 2,500 feet 12-inch, 2,800 feet 15-inch; depth of cut 4.74, 210.05 feet. Estimated cost \$4,105; E. H. Clock, auditor, Cottonwood county.

Mont., Great Falls—Low bid for construction of structures Sun River diversion work reclamation service, were: Heyden Bros., Portland Ore., as follows: Schedule 1, \$104,937; schedule 2, \$83,803; schedule 3, \$54,234; total, \$242,975. MacArthur Bros. Co, New York, schedule 1, \$112,165; schedule 2, \$101,332; schedule 3, \$61,246; total, \$274,744. Meinecke

Building Co., Marmouth, N. D., schedule 2, \$112,696; schedule 3, \$62,592; firm did not bid on schedule 1. Midwest Engineering Co., Omaha, Neb., schedule 3, \$65,361; company filed no bids on schedules 1 and 2. All proposals will be forwarded to Washington for consideration by secretary of the interior department.

Mont., Madison Valley—Survey completed by Thomas D. Tice for irrigating ditch east side of the valley.

Neb., McCook—Percy Bell, county engineer, Hitchcock county, has planned a 4-mile ditch for Alex Campbell of Poe, to irrigate 1,760 acres.

N. D., Lakota—Bids received until 2 p. m., Feb. 3, on construction of county drain 1, by Jacob Franzen, secretary, Mapes, N. D., route 1.

Wyo., Wheatland—Contract will be let for about one mile of ditch work. For particulars address Chas. Wilson, Wheatland, Wyo.

CONTRACTS AWARDED.

Minn., Bemidji—C. G. Ecklund, Grand Rapids, Wis., has completed contract on judicial ditch 15.

Minn., Crookston—Contract awarded to B. E. Morgan, St. Cloud, Minn., at \$9,676, for constructing ditch 89 Polk county, other bid was: W. H. Small, Aitkin, Minn., at \$12,500; H. J. Welts, county auditor.

N. D., Mayville—Contract for Roseville ditch awarded to company of farmers near. Jardine & Anderson, of Mayville, got contract for new bridges on the Roseville drain.

Wis., Cumberland—Contract awarded to Wisconsin Drainage Co., Elkhorn, Wis., at \$2,650, for ditch 3 miles long, by joint meeting, town boards of Crystal Lake and Maple Plain; work to start in spring.

WATER WORKS

Notes Arranged Alphabetically by States.

Alta., Edmonton—Superintendent Turner has recommended to council to raise \$75,000 for installing water meters.

Ida., Twin Falls—Local citizens considering additional water supply for city and construction of trunk pipe line from point on main canal near Murtaugh to town of Buhl, which will supply all towns on tract with clean water.

Iowa, Boone—Gilbert Station near here has voted bonds for \$6,000 to erect and equip a municipal water plant.

Iowa, Fairfield—Des Moines Bridge & Iron Co. awarded contract for steel tank foundation at \$5,555.

Iowa, Ferry—Election Jan. 6 to vote bonds for \$35,000 for water works; Adrian Cross, clerk.

Iowa, New London—Bonds for \$3,000 were voted for extension of water mains.

Man., The Pas—A by-law was passed voting the sum of \$130,000 for completion and extension of water works and installing an electric light plant.

Minn., St. Paul—Bids received by John Caulfield, purchasing agent, Jan. 12, 11 a. m. for furnishing and delivering f. o. b. cars, cast iron water pipe as follows, 50,000 feet 6-inch with privilege of 10,000 feet additional; 2,004 8-inch, 6,000 12-inch, 3,000 16-inch and 240 20-inch pipe to be delivered before May. Check for \$2,000. Bids will be received at same time for 3,560 30-inch class B, 9,360 30-inch pipe class A; check for \$2,000. For special castings 24-inch to 30-inch inclusive; check for \$300; for water gates or valves from 4-inch to 36-inch; check for \$500. For certain valve and stop boxes that may be used during the year; check for \$500; special castings 4-inch to 20-inch; check for \$500; separate bids on all the above.

Minn., St. Paul—Bids received Jan. 12, 11 a. m., by John Caulfield, purchasing agent, for furnishing hydrants for the year, 1914; bids must be submitted on sizes No. 1 and 2, f. o. b. freight prepaid; check for 10 per cent.

Minn., Warren—Rasmus Hage, city recorder, was directed to consult engineers about plans and specifications for water works extensions and electric light plant.

Mont., Hardin—Bonds for \$41,600 were voted for a water works system; B. C. Lillis, Billings, has prepared plans and specifications, the pump system will be used in the plant and water will be elevated into a 70,000 gallon tank.

Mont., Hardin—A bond election will be held to vote on bonds for \$41,600, for a better water works system. F. M. Lipp, city clerk.

Mont., Lewistown—Bids received 4 p. m., Jan. 5, for 12 Eddy fire hydrants by H. L. Fitton, city clerk; check for 10 per cent.

Neb., Mead—Bruce & Standeven, Omaha, have been engaged as engineers for the proposed water works and electric light plant.

Neb., Scottsbluffs—Bids received till 6 a. m., Jan. 15, for all labor and material for constructing extensions to water works system, 14,200 lineal feet 4-inch class B; 4,050 lineal feet 6-inch class B cast iron pipe, 17 fire hydrants, 12 4-

inch valves and 5 6-inch valves, 17 valve boxes, 7,100 special castings. Yoder & Liljenstolpe, engineers; check for \$500.

Ore., Baker—An election held Jan. 7 to vote on issuing bonds for \$44,100 for construction of a pipe line from reservoir to S. Baker.

Ore., Baker—Election will be held in January to vote on bonds for new water main, estimated cost \$44,072; L. R. Stockman, city engineer.

Ore., Umatilla—Plans and estimates for water system has been submitted by Louis C. Kelsey, consulting engineer, Portland; election will be called to vote on bonds for \$20,000.

S. D., Mitchell—A pump and motor will be purchased for the water plant by City Engineer Smith; estimated cost \$2,500; L. P. Wolff, St. Paul, consulting engineer.

S. D., Springfield—Bonds for \$5,000 were voted for extension of water mains.

Wash., Little Falls—A. L. Richardson engineer, Henry building, Portland, is making preliminary plans for water works here.

Wash., Shelton—Bids received by P. D. Fairchild, clerk, till Jan. 15, for construction of dam at the source of the water system.

Wis., Kenosha—Election will be held to vote on issuing bonds for \$100,000 for a filtration plant also intake.

Wash., Shelton—Bids received Jan. 15, P. D. Fairchild, clerk, for construction of dam at source of water system.

Wis., West Allis—Residents have petitioned for extension of mains on Burnham st. and 53d av. Guy V. Woody, engineer, Allis Chambers Co., has been engaged to co-operate with city engineer E. G. Orbert to make plans for addition to water works system and new pumps; Henry Freeman, chairman.

ELECTRICAL

Notes Arranged Alphabetically by States.

Idaho, Priest River—L. V. Smith and a party of engineers have been looking over the power sites belonging to the Pan Handle Railway Co. As soon as the situation warrants a modern power plant will be built on Priest river to supply nearby towns with electricity.

Idaho, Priest River—Council is considering a municipal electric light plant.

Ida., St. Anthony—The Utah Power & Light Co. will build a new power plant on the site of the present one which will develop 750 h. p. Work to begin in spring.

Iowa, Primghar—Mr. Jones of the Peterson Power & Milling Co., addressed a meeting at the court house and suggested a line to Sutherland and that the town of Primghar should build it and sell the power to the people.

Minn., Baudette—Council will receive bids until Jan. 5 for a 12-foot addition to the power house and furnishing and installing therein a 14x18 engine of 225 R. P. M. direct connected to a three phase 100 k. w. alternator with suitable exciter, switchboard panel, one 60x16 boiler; a 4x4 brick stub for stack and 30x60 stack made of No. 10 steel, boiler pump etc., all erected on standard foundations and brick settings, steam exhaust, together with necessary wiring and all other work necessary to connect the new plant with the old; Geo. B. Patridge, city clerk.

Minn., Beltrami—This village is considering securing electric current for lights from the new power dam now being erected near Crookston.

Minn., Clara City—Council is negotiating with both the Maynard council and Montevideo Electric Light & Power Co., to install electric lights at this place.

Minn., Edgerton—The Edgerton Telephone Co. is beginning the erection of three rural lines and a fourth one will be put in next spring.

Minn., Ironton—Council is planning to establish a municipal electric light plant.

Minn., Minneapolis—The Electric Short line will start the construction of 350 miles of road next year. This week the road to Long Lake will be completed. The first car is on the way from St. Louis and 12 flat cars and 8 box cars are at the terminals. Earl D. Luce, president.

Minn., Parkers Prairie—C. J. and Lee Morrison will begin at once the installation of the electric light system. They will put in a gasoline engine and storage battery system.

Minn., St. Cloud—An interurban line from Minneapolis to Duluth, is planned by Minneapolis Union Electric Co., construction work to begin early in spring. T. A. Shadwick, superintendent.

Mont., Billings—The Big Horn Canon Irrigation & Power Co. has completed survey for a railroad 68 miles long from the Canon to Custer, power will be developed from a dam the company will build in the Big Horn Canon. A. W. F. will have supervision.

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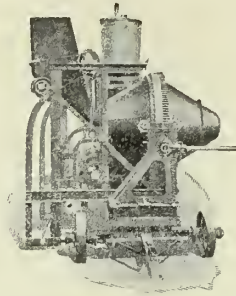
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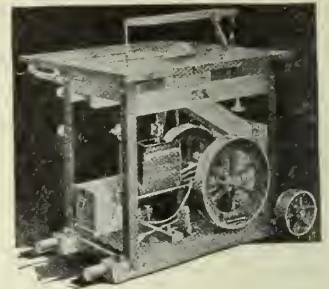
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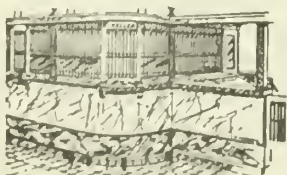
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Mont., Sheridan—Chamber of Commerce has started a movement for ornamental lights.

N. D., Cando—Commercial club interested in construction of white way on business streets.

N. D., Casselton—Hallett & Lynch have been granted a franchise to install an electric light plant.

N. D., Ellendale—J. L. Tucker, representing the St Paul Electric Co. met with council in regard to establishing an electric light plant here.

N. D., Fargo—The Northwestern Telephone Co. bought the exchange at Minnewaukon, Leeds, Esmond, York, Dickey, Sanborn, Marion, Adrain.

N. D., Hazelton—A co-operative company is to be formed to put in an electric light plant.

N. D., Hazen—The capital of the Knife River Telephone Co. will be increased.

N. D., Krem—The Mercer County Telephone Co. will build a line to Hazen, and in the spring a line will be built from Stanton to Hanover.

N. D., Lansford—Council is considering an electric light plant for next year.

N. D., McClusky—Phillip Kiefer, Moorhead, Minn., will put in an electric light plant here if he is given a franchise and a site.

D. N., Wyndmere—A bond issue will probably be voted for the building of a municipal light plant.

Ont., Port Arthur—A by-law will be submitted to authorize the issuing of debentures for \$35,000, for improvements to the street railway plant.

Ore., Eugene—Western Union Telegraph Co. and S. Pacific Co. are making plans to begin construction of telegraph line between Eugene and Marshfield, work to begin early in spring.

Ore., Klamath Falls—Department of interior have acted favorably on petition of city for establishment of power plant in connection with Klamath reclamation project. Government to construct plant and city to finance same.

S. D., Brookings—The Commercial club has secured within \$2,900 of the amount necessary to bring the Luce electric line here.

S. D., Dell Rapids—N. C. Draper was granted a franchise for electric lights and power; Jas. Ridlington, city auditor.

S. D., Springfield—Bonds were voted for \$10,000 for a municipal lighting plant.

Wis., Dousman—R. L. Adams sold his electric light plant to L. J. Bichel who will move it to his mill; work of setting poles from village to mill will begin at once.

Wis., Kenosha—Rebuilding the lines of the Kenosha Home Telephone Co. will be started at once estimated cost \$60,000 to \$80,000.

Wis., Wausau—First application for permission to build a power dam under a new law enacted by the last legislature has been made by C. M. and J. M. Arnquist of this city. They will build a 400-foot dam in the Apple River near the village of St. Prairie and erect an electrical plant and sell current to other towns.

Iowa, Council Bluffs—Plans for construction of a 2-story brick building on new archway, over Indian Creek are in course of drafting and work will probably start in spring, brick and concrete construction; cost about \$12,000 to \$15,000.

Iowa, Irvington—J. M. Watson will erect a large business house soon.

Iowa, Knoxville—H. F. Liebbe, state architect, is completing plans for a jail in which to keep the refractory ones who don't want to be cured.

Iowa, Perry—A. Powell will build a new warehouse and store room, cement block construction 28x90.

Mich., St. Joseph—Plans prepared by Harry L. Colton and Ralph H. Oliver, of Chicago, Ill., have been accepted by the council committee for the new city hall; cost \$30,000.

Mich., St. Joseph—Council has accepted plans for city hall, jail and fire house; brick and stone, \$30,000; H. L. Colton and R. H. Oliver, architects, First National Bank building, Chicago.

Minn., Hibbing—An effort will be made to secure a Carnegie library.

Minn., Hibbing—The council has taken under advisement a petition for a third floor to be added to the new fire hall now being constructed, and will advise with the architect.

Minn., Moorhead—Plans are being discussed for an auditorium.

Mo., Richmond—Bonds in the sum of \$100,000 for a court house have been voted by Ray county, and it is reported that no architect has been selected; address county auditor.

Mo., St. Louis—It is announced by Col. B. S. Stanley, of the quartermaster's corps, that plans for the proposed army supply depot to cost \$500,000 have been approved by the war department.

Mont., Butte—County commissioners have called a special election for Feb. 24, to vote on bonds for \$100,000 for the purpose of completing, equipping and furnishing the new jail building in Silver Bow county; Gus Stromme, chairman of the county commissioners.

Mont., Livingston—Contract with Wm. Sworder for a 2-room building at the county fair grounds.

***Mont., Roundup**—Plans for the new jail have been approved and bids will be opened Jan. 12; building will be 34x28, cage in one end containing four cells.

Neb., Burwell—As soon as plans for the library building are approved, the Carnegie funds will be forwarded; work will not begin before spring.

***Neb., Fairfield**—At a mass meeting of citizens and Company H of the N. N. G. the subject of building an armory was discussed and a committee appointed to draw up articles of temporary organization; a brick building, 60x70, is proposed.

Neb., Hartington—An effort is being made to secure a Carnegie library building; the Commercial club is back of the proposition, of which Geo. I. Parker is president.

N. D., Des Lacs—This village contemplates a town hall; address city clerk.

N. D., Ellendale—City council decided to build a city hall just as soon as work can be begun in the spring; building to be 40x70, 2-story, brick; lower floor for fire apparatus, upper floor for council; address city clerk.

N. D., Minot—R. T. Frost, architect, Minot, N. D., is preparing plans for a cold storage plant for the Northwestern Cold Storage Co., 50x116, fireproof, cost \$17,000; concrete foundation, pitch and gravel roof, cement plaster, concrete flooring, hollow tile, refrigerating machinery.

N. D., Minot—It is announced that bids will be received for the federal building here the 1st of March, and contract let latter part of April; building is to cost \$150,000.

S. D., Aberdeen—Bids received by Geo. F. Fossum, architect, until Jan. 5, (not 15th as improperly noted in a recent issue) for jail cells, corridors, etc., for jail department of city building; F. W. Raymand, city auditor.

S. D., Mission Hill—Contract with Peter Totland and Andreas Ekern for the erection of the new town jail.

Texas, Abilene—Contract has been let to A. Z. Rogers, Henrietta, Texas, for the Taylor county court house at \$117,900. Other bidders were R. C. Lewis, city, \$145,000; Reinhart & Donovan, Oklahoma City, \$131,964; Buchanan & Golden, Corsica, \$138,339; L. R. Wright & Co., Dallas, \$122,144; Clayton & Amos, Sweetwater, \$128,750.

Texas, Abilene—Contract for Taylor county court house awarded to A. Z. Rogers, Henrietta, at \$117,900; heating and plumbing to Hill Bros. of Waco at \$12,000; concrete frame building, brick faced, stone trim.

Wash., Seattle—Fire damaged property of Dr. S. J. Holmes and H. E. Holmes, \$2,000; Hotel Burnside, \$500; Rice restaurant; total loss \$5,500.

Wis., Chilton—Fire destroyed the store building and contents of C. W. Kliet, loss about \$15,000.

PUBLIC BUILDINGS

Notes Arranged Alphabetically by States.

***Ark., Heber Springs**—Bids received by the county clerk until Jan. 22, for a brick and concrete fireproof court house to cost \$50,000; Clyde A. Ferrell, architect, Little Rock, Ark.

B. C., Phoenix—Contract for the lock-up and constable's quarters awarded to Davies & Sanders, 615 Hastings st. W., city; figures may be taken later on lumber.

B. C., Vancouver—Final detail plans are being prepared by A. Campbell Hope, architect, Empire building, for the proposed sub-postoffice building in Mt. Pleasant district; preliminary to the asking of bids; cost about \$100,000.

B. C., Vancouver—Plans for the armory have been prepared by Perry & Fowler, architects, Pacific building, city, and it is said the Dominion government has authorized an appropriation of \$350,000; the plans have been finally approved.

***B. C., Victoria**—Council has approved plans for the proposed city jail to cost \$80,000; plans being prepared for the city hall to be built by the dominion government, to cost \$400,000.

B. C., Victoria—Reported that plans have been completed for the construction of the proposed new printing office and the new museum addition in connection with the legislative buildings at Victoria. The new museum addition, according to the plans, will cost not less than \$1,000,000, and will have room for many more government offices. The new printing office will also provide for additional government offices, and in round figures will cost \$1,000,000.

Colo., Grand Junction—Architect has been instructed to prepare plans for the new fire station and police headquarters; 2-story, frontage of 33 feet, brick, stone and modern.

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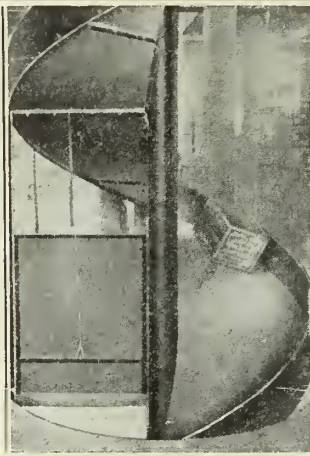
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Wis., Friendship—Interior finish not bought for the court house; Chas. W. Noble, general contractor, La Crosse, Wis.

Wis., Grand Rapids—Contract with the Thomas E. Hoyer Heating & Ventilating Co., Milwaukee, to provide proper ventilation in the court room of the county court house at \$1,092.

Wis., Kenosha—The county board has appointed a committee, of which Thos. S. Scott, 765 Prairie av., Kenosha, is chairman, to investigate the feasibility of building a county workhouse here.

Wis., La Crosse—The county will build a \$3,000 barn at the county asylum; Bert A. Jolivet, county clerk.

Wis., Merrill—Val Henrich will have charge of the remodeling of the circuit court rooms.

Wis., Racine—County board has made appropriation for a new barn at the county asylum; W. J. Hat, county clerk.

Wyo., Upton—Corner stone for the new armory building was laid recently.

HOTELS AND HOSPITALS

Notes Arranged Alphabetically by States.

Ark., Little Rock—John W. Gaines and Scipio Jones, negro lawyer, of Little Rock, propose to erect a modern \$50,000 hotel for negroes.

B. C. Nelson—Paul Larson will build a 3-story boarding house frame, 40 rooms, cost about \$8,000.

B. C. Nelson—Plans under way to build a hospital building to cost \$70,000; building will be known as the Kootenay Lake general hospital.

B. C., Victoria—Bids for the Jubilee hospital, to cost \$400,000, will be called for in January; L. P. Rixford, architect, will prepare detail plans at once.

B. C., Victoria—F. Fairhurst, owner and builder, will erect an addition of 36 rooms to the frame hotel at 1304 Queens st.; estimated to cost \$20,000, day labor.

Iowa, Decorah—Plans are in progress for a hospital building, 36x70, 2-story and basement, owned by the city, Decorah General hospital, Ben Bear, chairman, Hill Turnock, architect.

Iowa, Manson—The Manson house is to be rebuilt the coming season.

Iowa, Swea City—Announcement is made that Dr. C. W. Mattison will soon erect a building to be used as a hospital.

Kan., Winfield—The Commercial club will purchase the Bretium hotel property and remodel and build an addition, with baths.

Mich., Ewen—Bids received after Feb. 10 by Anderson & Williams, architects, Green Bay, Wis., for hotel to cost \$15,000; concrete foundation, brick walls, composition roof, oak interior finish, steam heat, electric light, plumbing, wood joists in floors, hollow tile; common and pressed brick, cut stone, concrete reinforcing, fire escapes, metal ceilings, hollow tile, hard plaster, skylights, shower baths, boilers, motors, vacuum cleaning system.

Minn., Anoka—Plans are in progress by C. H. Johnston, architect, St. Paul, Minn., for cottages No. 8 and 9, each 3-story, at the insane asylum; cost \$55,000; Downer Mullen, secretary board of control, St. Paul, Minn.

Minn., Bemidji—Plans for the proposed summer hotel here, drawn by C. H. Johnston, architect, St. Paul, have been received; the matter of construction will soon be taken up; W. L. Brooks, chairman of committee in charge.

Minn., Gary—Mrs. F. Barry will build a hotel here this winter will contain 40 rooms and cost \$7,000 to \$8,000.

Minn., Moorhead—Sam Field announces that the Palace will be rearranged and entirely altered.

Mont., Forsythe—Dr. Harry J. Heune has been receiving figures for a hospital building, 43x96, 2-story and basement; cost \$30,000; Wm. F. Burfiend, architect, 189 W. Madison st., Chicago, Ill.

Mont., Sidney—Andy Mercer has purchased a site and will build a reinforced concrete hotel three stories, full basement, the building to be 56x112, in dimensions, and containing a bar, cafe and 60 up-to-date, well-furnished, well-ventilated and heated rooms, each containing telephone service, all modern in every respect.

Mont., Ryegate—Excavation completed for hotel being built by G. M. Babcock, Belfield, N. D.; building will be 3-story, baths, electric light.

Neb., Omaha—Bids for the Fontanelle hotel are to be open Jan. 10, and it is understood that invitations for bids will be sent to from ten to fifteen contractors.

N. D., Bismarck—The largest building project for the year will be the new St. Alexius hospital, to cost \$100,000, and to be built by the sisters of the order of St. Benedict. Building will consist of three wings, the central wing five stories and the two laterals four stories each; will accommodate 100 patients at a time.

N. D., Cooperstown—Jens O. Limesand has purchased the Sutton hotel property and will remodel the building.

N. D., Hillsboro—Preliminary arrangements are being made for a \$20,000 hospital; Ole Arnegard, chairman of committee.

N. D., Rock Lake—The hotel here, owned by J. B. Keeney, burned Christmas eve, and together with the contents was a total loss; loss will exceed \$10,000, and only partly covered by insurance.

Okla., Madill—J. E. McMillan will build hotel here costing \$30,000.

S. D., Yankton—Bids received by the architects, Hardford & Jacobson, 601 Capital Bank building, St. Paul, Minn., from Jan. 15 to Feb. 15, for a hospital building for the Mounty Marty hospital of the Benedictine Sisters; 165x80, 4-story and basement; cost \$100,000.

Texas, Beeville—Hotel Beeville will be built by public subscription at estimated cost of \$6,000; M. W. Bates, interested.

Texas, Paris—The Gibraltar Life Insurance Co. intends building a fireproof hotel and office building.

Utah, Roosevelt—The Buckeye Land & Water Co. will erect a modern rooming house at this place next spring.

Wash., North Yakima—Norman Bros., lessees of Hotel Yakima, considering building larger hotel to cost \$200,000.

Wis., Beaver Dam—Plans completed for the remodeling of the Milwaukee house; Mrs. Anton Seifert is the owner.

Wis., Waukesha—Bids received by Morgan R. Butler, chairman board public works, until 2 p. m., Jan. 14, for a public hospital.

Wis., Whitelaw—Sketches are being prepared by Roeuber & Mehner, Manitowoc, Wis., for an addition to the tuberculosis hospital; to cost \$4,000; C. A. Groffman, secretary of the board of trustees, 925 S. 8th st.

CONTRACTS AWARDED.

B. C., New Westminster—Contract to McIntyre & Matheson, city, for an addition to the Colonial hotel, to cost \$2,500.

B. C., Port Coquitlam—Contract to W. H. Mueller, city, for a 2-story hotel building for H. C. Thornton, at \$52,000; sub-contracts all in.

B. C., Victoria—Contract to Waddington & White, city, for alterations to the Manitoba Bar, costing \$10,500; owners are Punnett & Williams; M. E. Durfee, architect. The work involves a 2-story concrete addition.

B. C., Victoria—Contract to Metzger & Weston, city, for hotel at corner of Government and Fort st., at \$25,000; coats & Fleet, architects; fireproof construction, hot and cold water, room telephones; plumbing and heating let to L. Borde, electrical work to Chas. Chitty.

Wis., Wauwatosa—General contract for the Milwaukee County Tuberculosis sanitarium awarded to American Construction Co., Milwaukee.

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

Ariz., Tucson—Movement is on foot for building a modern theater to cost \$50,000; Roy B. Gill will take a lease on it when finished; seating capacity of 1,000.

B. C., Revelstoke—Negotiations now pending looking towards the construction of a first-class moving picture theater; report is that the Vancouver promoters have purchased a site from Mr. Lawrence, of Lawrence's Hardware, Revelstoke.

B. C., Victoria—Princess will be closed for two months in early part of the year to permit reconstruction; seating capacity will be enlarged from 600 to 1,000; cost \$35,000.

Colo., Aspen—O. H. Chambers has purchased the bank building corner of Hymen and Galena sts. and will remodel it for a motion picture house.

Colo., Steamboat Springs—Work has begun on remodeling the Albany hotel into an opera house; seating capacity of 500; steam heat will be installed.

Iowa, Des Moines—Elbert & Getchell will erect a new moving picture theater within the next 6 or 8 months.

Iowa, Grundy Center—Bids received by C. H. Johnston, owner, until Jan. 15, for a building to be used for picture shows and for flats; 41x80, 2-story; steel trusses, beams and cast columns, fire escapes of iron and iron ornamental work and stairs, limestone, common, pressed and hollow red brick, furnace heat, city water, electric light, sheet metal ceiling, common plaster, tiled and maple floors, pine finish.

Iowa, Le Mars—Fredonia chapter of the National Grange will build a hall in the spring; Frank Perry, secretary.

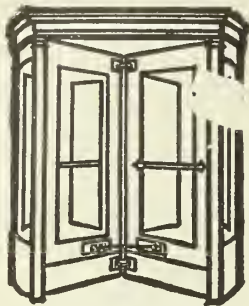
Iowa, Le Mars—Knights of Columbus propose building a hall and theater this year.

Iowa, Missouri Valley—Beaver lodge here has incorporated and will build a \$20,000 lodge room, 2-story, brick or concrete.

Iowa, Riverton—A stock company is to be formed to build an opera house; address the mayor.

Iowa, Waterloo—The Moose Building Co. has filed articles of incorporation, its purpose being to build a Moose club house; H. E. Tullar, secretary.

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Kan., Iola—Eagles will erect a modern building if site can be secured; address the secretary.

Minn., Brainerd—The Boosters' club has adopted a resolution favoring bonds for the new city hall, fire hall, etc.

Minn., Lake City—The general contractor for the remodeling of the motion picture theater owned by B. A. Gernes is putting in a new front; Fred Beseler, Winona, Minn., contractor.

Minn., Pipestone—Work will soon start on remodeling and addition to the theater owned by O. & J. Nodegraff; \$3,000; Monarch Studios, architects, Shubert building, St. Paul, Minn.

Mo., Hannibal—Plans now in preparation for an Odd Fellows temple, 3-story, brick, stone, steam heat, and modern; cost \$75,000.

Mont., Helena—Plans for the Y. M. C. A. building completed and bid will be received Jan. 20; cost \$100,000; reinforced concrete frame, concrete columns, girders and floor slabs; outside walls of brick and hollow tile; front will be faced with stone, brick and terra cotta.

Neb., Fullerton—Bids for the proposed Odd Fellows' building to be opened Feb. 15; R. O. Richardson, owner; M. N. Bair, architect, Hastings, Neb.

Neb., Kimball—J. B. Sweatt of Heath will erect a modern fireproof brick building next spring to be used for a theater; 50x100; tentative contract has been drawn.

Neb., Plattsmouth—The remodeling of the building on N. 6th st. into a home for the Elks has been progressing rapidly.

Neb., Tekamah—M. B. Moore has purchased site and will build an opera house; 2-story brick proposed; lower floor for opera house and upper for lodge purposes and public gatherings.

N. D., New Rockford—L. L. Devereaux has purchased a lot and next spring will erect an opera house.

Utah., Pleasant Grove—The Beers' building is to be remodeled as a motion picture house.

Wash., Moran—Moran Prairie Grange has applied for incorporation papers and will build a \$20,000 hall.

Wis., Beloit—Plans for a large hall are being perfected by Germania Liederkrantz; estimated cost is \$40,000; George L. Ritzhaupt, president of the society.

Wis., Cambridge—Plans are in progress by J. K. Neebe, 2101 W. Chicago av., Chicago, for a hall, 1-story and balcony, 48x100; owner H. A. Olson, care architect.

Wis., Kewaunee—Work is in progress on the picture theater addition to the Palace theater; 1-story, 35x20, brick; Frank Hirschfeldt, manager.

CONTRACTS AWARDED.

Minn., Little Falls—Contract has been let for the interior decorations for the Victor theater.

N. D., Fargo—Contract with Chas. Zeller of Moorhead and J. M. Johnson, Fargo, for remodeling of building on Broadway for a motion picture theater.

N. D., Hope—Contractor Hardin is remodeling the Bijou theater; Anderson & Tysk are redecorating.

Wash., Seattle—Contract has been let to S. G. Coombs for Alaska theater, to cost \$125,000; Warren H. Milner, architect, Arcade building.

Wash., Tacoma—Contract for a 2-story building to be erected by David Goss has been made with Moeller & Dawson, at \$40,000; white glazed brick; on the first floor a moving picture theater will occupy part of the building; excavation is completed.

SCHOOLS

Notes Arranged Alphabetically by States.

Iowa, Boyer—Rev. Father Hetherington was circulating petition for erection of a new parochial school to be built here next summer.

***Iowa, Fort Dodge**—The First Ward school will be finished in May instead of time set in contract Aug. 1.

Iowa, Grand Junction—Board of education will vote \$45,000 school bonds, Jan. 16.

Iowa, Kellogg—\$40,000 bonds were voted for school house.

Iowa, Kiron—Plans have been prepared by J. H. Craddock, architect, for erection of a \$16,000 school building here.

Iowa, Laurens—A 2-story brick school house will be erected here, 132x74, modern throughout; combined system of steam and hot air heat, lockers, shower baths, gymnasium, corridors and stairways, reinforced concrete, with asphalt covering, making them fireproof, maple floors, oak finish, exterior wall will be brick with stone soursings, flat roof.

Iowa, Marshalltown—Special meeting will be held Jan. 26, 7 p. m., to consider bids on new school house to be erected in Liberty township consolidated school district, Marshall county, Iowa; plans on file at office of superintendent, Marshalltown, state superintendent, Des Moines, or president of school board, J. R. Howard, Clemons, Iowa; cost \$12,000, fire-

proof, 54x56, 2-story, hollow tile construction, cement floors, modern throughout.

Iowa, Merrill—School board will call special election soon to vote on advisability of erecting an addition to their school house.

***Iowa, Monticello**—Bids received by E. E. Reed, secretary, until 2 p. m., Feb. 3, for a gymnasium and class room. Officially advertised in this issue of the Improvement Bulletin.

***Iowa, Pella**—The Pella Commercial Association is favoring the erection of a new high school building.

Iowa, Plymouth—Advisability of erecting a consolidated school house is being discussed.

Iowa, Postville—A petition is being circulated for a new \$40,000 school building here; election will be held soon.

Iowa, Sioux City—Structural steel for the auditorium of new school annex has been placed and roof and walls have been started.

Iowa, Walnut—\$25,000 school bonds were voted at Exira.

Mich., Detroit—Plans are being prepared for a 2-story engineering building to be erected by the university of Detroit, plans by architects, Oscar O. Gottesleben, 724 Dime Bank building; cost \$50,000; Rev. L. A. Leahy, secretary, university of Detroit, 363 Jefferson av. E.

Minn., Blue Earth—Bids received until Jan. 24, for erection of a school house in district 104, plans to include both lumber and cement blocks; contract to be let Jan. 24; check for 5 per cent; Albert Tillia, clerk.

Minn., Brainerd—Bids received Dec. 31, 1913, for erection of a 2-room school building at Riverton in district No. 45, at 8:30 p. m., J. C. Herbert, clerk.

Minn., Duluth—Construction of the R. E. Denfeld industrial school West Duluth and the Munger school, 13th av. E., will be discussed at meeting Jan. 2.

***Minn., Foley**—All bids were rejected on the high school annex, lowest bid, \$12,983, that of Wm. Stromberg, new plans and specifications will be drawn by architect.

Minn., Moorhead—The school board are considering erection of a \$100,000 high school building.

Minn., Winona—Plans and specifications for the new model school have been revised by Architect Johnson, and new bids will be re-advertised.

***Mont., Billings**—Work has begun on the Losekamp memorial conservatory of music; to be erected by the students of Billings Polytechnic institute; ground for school was purchased by James J. Hill at \$25,000.

***Mont., Enid**—Bids received Jan. 10, for purchase of \$600 school bonds, district No. 102, Dawson county, Oliver Oakley, clerk.

Mont., Havre—Plans are being discussed for building addition to the high school.

Mont., Rygate—Contract awarded to Andrew Dale for erection of new school house at \$1,225, work to start at once.

***Neb., Hastings**—Rutherford Bros. have contract for new school house at Arnold.

***Neb., Lincoln**—The board of education last week awarded contracts for plumbing, heating and wiring of the high school and Bancroft school, to L. W. Pomerne and F. C. Phillips & Co., and Aaron Sullivan.

***S. D., Ravinia**—A new school house is being erected here.

Wash., Seattle—Plans are being prepared by Edgar Blair, 901 7th av., for a 2-story reinforced concrete and steel school building to be erected on 75th and 9th av.; cost \$400,000.

Wis., Fond du Lac—Contract for wiring the Union school was awarded to L. A. & W. F. Briggs, for \$365, two other bids were received; H. L. Wallichs and Paul Wallichs.

Wis., Rhinelander—A \$12,000 addition is being erected to the Florence high school.

MILLS AND FACTORIES

Notes Arranged Alphabetically by States.

Alta., Calgary—A proposition voting \$500,000 for the construction of a gas main in oil field, and for the purchase of the old gas plant will be submitted in the spring; City Engineer Craig will report on proposition.

Alta., Red Cliff—H. A. Bonner, 99 Farnham av., Toronto, will establish a knitting factory here.

Iowa, Burlington—The Sidway Mercantile Co., of Elkhart, Ind., will erect a large baby carriage factory here.

Iowa, Estherville—The cement block and tile factory recently burned will be rebuilt in time for manufacture of cement blocks in spring.

Iowa, Grandview—Fire recently destroyed the lumber yard of the Grandview Lumber Co., loss \$25,000.

Iowa, Sioux City—Fire damaged the sash and door factory of the John J. Keefe Co., about \$11,000.

Neb., Falls City—Plans are being made for erection of a cold storage plant here; cost \$25,000.

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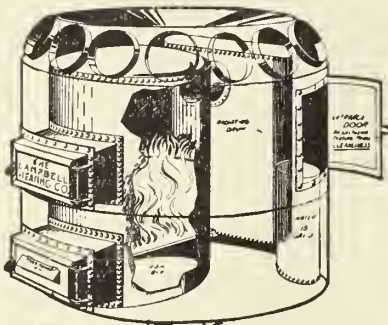
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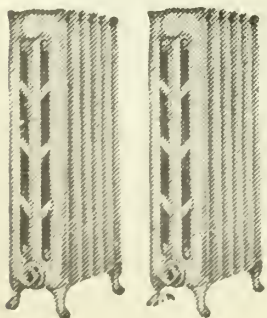
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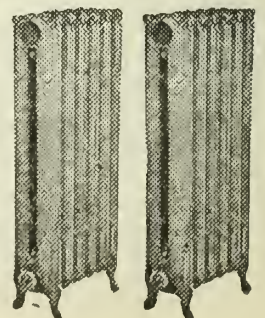
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N. D., Drake—H. O. Mellard of Morris, Minn., contemplates building a flour mill here.

N. D., Norwich—Farmers are discussing plans for a co-operative creamery.

Man., Goodlands—Steel for the new plant of the Saskatchewan Bridge & Iron Co., Ltd., of Medicine Hat, is being erected, so that work can be carried on this winter. The Saskatchewan Bridge & Iron Co., will also commence erection of 40 homes for its employees.

Mich., E. Jordan—The sawmill of the East Jordan Lumber Co. was burned; loss \$200,000.

Minn., Hibbing—H. L. Hartley will build an addition to his creamery.

Minn., Thief River Falls—The new firm known as Thief River Iron Works will open business here; members, John Wiley, C. L. Diffenbacher and Ray Wiley.

Mont., Billings—W. J. Scott and J. F. Kelly, president and contractor of the Kelly Mercantile Co. will commence work about Jan. 15, on a \$10,000 concrete culvert factory.

Mont., Cove Orchard—Local Chamber of Commerce has stated that a \$30,000 canning factory will be built here next summer.

Mont., Wilsall—Geo. W. Monroe will erect a farmers' custom flouring mill.

N. D., Dunseith—Flouring mill at this place was burned, loss estimated at \$1,000; Wm. Gottbregt, owner.

Ont., Ft. Arthur—T. H. Fields of West Hamilton may erect a pottery plant here.

Sash., Davidson—A resolution was passed voting the sum of \$8,000 for purchase and installation of an electric light and power plant here.

Sask., Mellville—The Dominion Milling Co., Ltd., will erect a flour mill, capacity, 300 barrels per day; Canadian Oil Co., Ltd. will erect a plant and 6 large storage tanks, costing \$166,000 in Brandon, Man.

Sask., Saskatoon—Mayor J. W. Fleming of Brandon, acting as agent for the Continental Gas & Electric Co., of Cleveland, O., laid a proposition before the officials that the company he is acting for, will construct a \$500,000 gas plant in this city to be in operation in 18 months after agreement is signed.

Sask., Swift Current—Work will commence shortly on the cold storage plant of the Calgary Brewing & Malting Co., Calgary, Alta.

Wash., Appleton—The Timber Valley Lumber Co. has incorporated, capital \$10,000; E. M. Cox and H. L. Lindley.

Wis., Boyceville—The M. A. Gedney Co. will build a pickle factory here; cost about \$10,000.

Wis., Kenosha—The Wisconsin Gas & Electric Co. will soon erect one of the largest tanks, ever built in state, for their gas plant.

Wis., Manitowoc—Fire damaged the Scottish Woolen Mills \$26,000.

Wis., Marinette—A permit was granted to the Marinette Packing Co., for erection of a packing plant.

Wis., Milwaukee—Fire destroyed the \$100,000 plant of the Willer Manufacturing Co., at 313-327 Cedar st.

Wis., Angus—A cheese factory will be erected here.

Wis., Milwaukee—Bradley & Metcalf will erect a shoe factory, 80x150.

Wis., River Falls—The River Falls Co-operative Creamery Co., will receive bids Jan. 15, 2 p. m., for erection of a creamery, cement blocks lined with hollow tile, 66x36, annex boiler room, 24x26, check \$200; plans on file at creamery.

Wis., Ruby—Fire destroyed the planing mill, dry sheds and 34,000 feet of lumber belonging to E. L. Hawn; loss about \$15,000.

CONTRACTS AWARDED.

Neb., Nebraska City—A. P. Young has contract for construction of the Wilson reinforced concrete products plant.

Neb., Neligh—Contractor Crendon contemplates erection of a laundry building and a dairy in the spring.

Sask., Moose Jaw—G. T. Brown Sash & Door Factory Co. will build an addition to its factory.

Wis., Tomah—Contractor Wallace of La Crosse has completed brick work on new creamery of the Farmers' Co-operative Butter association, new building, 46x72, modern.

PARKS AND CEMETERIES

Minn., Duluth—The city's area of park land will be enlarged by 70 acres when a deed of a tract north and east of the Snively farm from Mrs. W. M. Prindle is executed.

Mont., Havre—Odd Fellows' Cemetery association, J. F. Haun, H. J. Halford, E. A. Enstrom, S. H. Viles, L. A. Nutt and H. L. Mitchell; all of Chester.

Neb., Beatrice—Huge piles have been driven down to bed rock for foundation for building that is to be erected to protect the machinery that will be installed as soon as pipe line is finished at Zimmerman Springs.

CHURCHES

Notes Arranged Alphabetically by States.

B. C., Coldstream—A movement is under way here for erection of a new church; W. E. Stevens, E. H. Suncliff and A. W. Coldstream, committee.

B. C., Victoria—School board has decided to reject all bids received on the Quadra st. school building, on account of lack of funds; also bids rejected for same reason on the St. Margaret's school.

Iowa, Emerson—Work is nearing completion on the M. E. church.

***Iowa Cedar Rapids**—A \$100,000 church will be erected here.

***Iowa, Cedar Falls**—The Catholic church damaged by fire will be wrecked and a modern new building erected.

***Iowa, Fort Dodge**—Work started on the tabernacle to be used by the First Methodist Episcopal church while their new structure is being erected.

Iowa, Merrill—The Methodists are planning to build a \$30,000 church.

Iowa, Randolph—Will Loobey has contract for erection of the Catholic church.

***Iowa, Waterloo**—\$800 has been raised toward the erection of the African Methodist Episcopal church here. Rev. I. W. Bess, pastor, \$1,500 is needed to build.

Minn., Centerville—The Catholics are planning erection of a church soon.

Minn., Ulen—The Synod, care H. H. Dahl, will erect a church in the spring; cost about \$4,000. Architect not selected frame construction.

Mont., Great Falls—About 15 more new churches will be erected in the diocese next year; total cost of improvements about \$200,000.

Mont., Havre—Plans for a \$50,000 church have been approved; plans for a similar church have been accepted for Lewistown. Work to commence in spring.

Mont., Helena—A new Catholic cathedral is being erected here.

Mont., Lewistown—Plans have been completed for St. Leo's Catholic church by architects Link & Haire, of Billings, Mont., building to be erected in spring, brick, terra cotta and stone; cost \$60,000; Father V. J. Van Dan Broeck, pastor.

Mont., Worden—C. S. Wilson has contract for excavation of the basement of the M. E. church.

Neb., Nebraska City—Bids have been asked for the new M. E. church at Sidney.

Neb., Pierce—Rev. M. F. Scheips, J. F. Kloterman and R. C. Bickendahl are consulting the architect who recently designed plans for the Lutheran church at Plainview, in regard to erection of a new church here; brick.

N. D., Alexandria—Work has begun on basement of the new Lutheran church, concrete basement, 34x48.

N. D., Farland—The Norwegian Lutheran congregation will build a church at Tobacco Garden cemetery next June; petitions are being circulated for funds.

N. D., Grand Forks—Fire damaged the interior of the Mendenhall Memorial Presbyterian church about \$3,000.

S. D., Colome—A \$2,000 Catholic church is being erected at Paxton.

***S. D., Huron**—Bids received by Rev. D. F. Desmond, rector, until 2 p. m., Jan. 31, for a church building for St. Martin's Roman Catholic church. Officially advertised in this issue of the Improvement Bulletin.

Wis., Horicon—A-story church, 42x106, will be erected by St. Malachy's congregation, Rev. Wm. H. Eggers, pastor, Frank Bodden, chairman building committee, postponed until spring; cost \$18,000; architects, Uehling-Kleser Co., 831 Wells building.

Wis., Neenah—Congregation of St. Paul's English Lutheran church has purchased a site and will erect a new parsonage.

Wis., Stoughton—The Christ Lutheran church plans erecting a church and guild house; cost \$20,000.

Wyo., Node—Work has been resumed on the Lutheran church again.

***Wyo., Sheridan**—The Swedish Lutheran Association are planning erection of a new edifice.

CONTRACTS AWARDED.

B. C., Grindred—Contract awarded to Donham & Gildemeister, for erection of school building here; and contract let to Cory & Wishart, for construction of school at White Rock.

B. C., North Bend—Contract awarded to A. Catherwood, of Mission City, for erection of a 2-room school at this place.

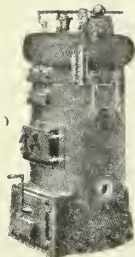
B. C., Port Alberni—Contract awarded to Warnock & Cochran of Port Alberni, for construction of high school; work to begin at once.

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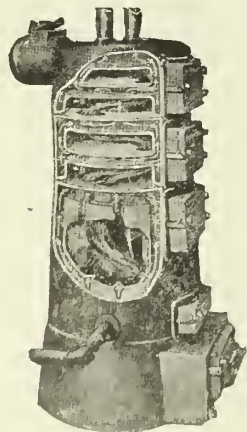
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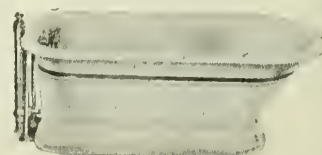
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BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Iowa, Bedford—The C. H. Nold Lumber Co. will erect new buildings for their lime business.

Iowa, Beloit—N. H. Brogden is erecting a building for a restaurant and candy kitchen.

Iowa, Burlington—The National Chemical Co. will build a modern building soon.

Iowa, Centerville—John Nicholson will build a new building, 18x28, modern, plate glass front.

Iowa, Dayton—C. J. Olson is building a new brick store building; there is talk of a new implement building being erected also.

Iowa, Des Moines—The Riverside Oil Co., of Pittsburg has closed negotiations for location of its general western headquarters here, a tank plant to cost about \$30,000 will be erected here.

Iowa, Des Moines—Fire and water damaged the stores and stock of the Sol Wolk Clothing Co. and Brinsmaid & Co., wholesale and retail dealers in china, about \$60,000; O. H. Thompson, owner.

Iowa, Des Moines—E. W. Brown will erect a garage.

Iowa, Dubuque—The Telegraph-Herald has just purchased 64 feet on Main st. and will soon begin remodeling.

Iowa, Elk Horn—John Pederson and S. C. Pederson will erect a bank building.

Iowa, Estherville—The cement block factory recently burned will be rebuilt.

Iowa, Jacksonville—Eskild Peterson is building a garage.

Iowa, Grinnell—The Merchants National Bank will erect a new building, 41x76, brick, 1-story; cost \$60,000; preliminary plans in progress; architect, Louis Sullivan, city; Geo. H. Hamlin, president.

Iowa, Leon—Greenlee & Logan contractors and builders are putting up a brick building for their wall paper and marble works shop, 20x40.

Iowa, Marshalltown—Thaddeus Binford will build a 2- or 3-story business building, 60x80.

Iowa, Muscatine—The Henry F. Kath Co. has been granted a five year lease extension held by the H. W. Cereal Co. on ground located on river front, upon condition that building now occupying same be improved. It is understood that extensive improvements will be made by corporation.

Iowa, Neola—Barrier & Son are building an addition to their garage and auto store room.

Iowa, Onawa—The Firm of Mitchell and Johnson are building a 4-foot extension to their building.

Iowa, Ricketts—Frame work on the new hardware store is up; building will be electric lighted throughout, 3-story.

Iowa, Shenandoah—Excavating work has started on basement of the Bogart building.

Iowa, Shenandoah—Work on excavation has started for the Bogart building.

Iowa, Storm Lake—Joseph Mattes will erect a new business block in Oldebolt in spring.

Iowa, Washington—Jesse Phillips is erecting a garage.

Kans., Garden City—J. V. Carter has commenced erection of a new building.

Man., Rapid City—E. S. Gardner will erect a brick veneer office building in spring.

Mich., Detroit—Geo. Bloss will build two stores and flats; cost \$15,000; architects, Williams Bros., 702 Whitney building, taking bids, to close at once; paving brick, 2-story, 46x70.

Minn., Afton—Harry A. Swenson has accepted a position as cashier in new bank to be opened in Afton, capital \$10,000; a new concrete or brick building will be erected in spring.

Minn., Bird Island—Brick work has started on the Lorenz store building; modern.

Minn., Crookston—Bids received Jan. 29, by architect, C. H. Johnston, 715 Capital Bank building, for erection of a 2-story bank and store building; cost \$50,000; pressed brick, reinforced concrete, composition roof, structural iron, marble, foundation let to Mr. Ross, Crookston.

Minn., Duluth—The Kelly-How-Thompson Hardware Co. will make extensive additions to their property. It is intimated that the Gowan-Lanning-Brown Co., shareholders, may erect a large warehouse next spring.

Minn., Lester Prairie—Plans are being drawn by architect for the new store building to be erected by John Kuhlman and Paul Weise.

Minn., Montevideo—M. H. Sheehan has begun excavation of basement for the Claggett & Sons store building; brick.

Minn., St. Paul—A Cathcart Maxfield will build a 3-story reinforced concrete and brick building, cost \$45,000; plans by C. H. Johnston.

Minn., Thief River Falls—The Thief River Falls Commercial club will erect a modern 4-story business building; cost about \$100,000.

Minn., Warroad—Holstead & Sullivan are preparing plans for a 2-story brick store building for J. Stein; cost about \$9,000.

CONTRACTS AWARDED.

Iowa, Chariton—Two stores and two flats will be erected by W. C. Dave Brown, general contract let to Andrew Stephens; brick, 2-story, 42x90; architects, Williams & Yule, 117

Minn., Duluth—Contract let to Emil Johnson of Minneapolis, for erection of the State Bank of Warba, Minn., at \$8,000; plans prepared by Anthony Puck, architect, Duluth.

Minn., Otisco—Contract let to the Calder Construction Co. of Minneapolis, for construction of new bank building, frame structure with stucco finish; directors: Roy Quimby, A. A. Eberhart, of Minneapolis, L. J. Johnson, A. F. Lang and M. D. Perkins, of Otisco; capital \$10,000.

Mont., Dixon—E. W. Rinehart has contract for erection of the Dixon Mercantile Co. hardware store.

Neb., Wauneta—Contract for the brick work has been let to McCook parties for the new building and work will commence at once.

ELEVATORS

Notes Arranged Alphabetically by States.

Iowa, Emmetsburg—Preliminary steps have been taken toward organization of a Farmers' Co-operative Elevator Co., committee appointed to prepare definite plans were: J. C. Brennan, Joseph Martini, Daniel Doyle and others.

Man., Transcona—A great effort is now being made by the N. Y. Foundation Co. to straighten up the C. P. R. elevator here.

Minn., Annandale—A potato warehouse will be erected by the farmers of this vicinity.

Minn., Marshall—Fire destroyed the office of the Farmers' Elevator Co. at Milroy.

Minn., Redwood Falls—The Farmers' Elevator at Melroy was badly damaged by fire.

Mont., Belgrade—D. R. Fisher has returned from a business trip to Lewistown and Fergus county where he has been superintending construction of elevators for the Gallatin Valley Milling Co. being built in Judith county.

Neb., Chappell—Another meeting will be held Jan. 3d, to discuss more definite plans for erection a farmers' elevator.

Neb., David City—The Schaf Elevator at Garrison was burned, Mr. Schaf, will commence erection of a new elevator soon.

Neb., Nebraska City—Work is being rushed on the elevator being erected by the Bartling Grain Co.

N. D., Alexander—Business men have organized Alexander Grain Co. and will build a 35,000-bushel elevator.

N. D., Elliott—Fire destroyed the Andrews Elevator here, causing loss of 40,000 bushels of grain and 140 tons coal.

N. D., Elliott—Fire destroyed the Andrews Elevator.

N. D., Stanton—An elevator and an iron clad power house will be erected by the Occident Elevator Co., Minneapolis, Minn., general contract let to L. A. Hickok & Son, 619 Flour Exchange building, Minneapolis, capacity 40,000 bushels; work not started yet; private plans.

N. D., Stanton—Star Elevator Co., Jamestown, S. D., will erect an elevator and iron-clad power house, capacity 40,000 bushels, west of Stanton, private plans, general contract let to L. A. Hickok & Son, 619 Flour Exchange, Minneapolis; work started.

N. D., Valley City—The question of terminal grain elevators will be discussed Jan. 3. at a meeting of the farmers of Barnes County.

RESIDENCES

Notes Arranged Alphabetically by States.

Iowa, Center Point—Wm. Floyd is building a modern residence.

Iowa, Northwood—Arnold Krogh will build a residence.

Minn., Brewster—Mike McCarvel will build a new farm house in spring.

Minn., Luverne—R. B. Hinkly is erecting a modern residence, 24x36.

Minn., Morristown—Joseph Turek will build a residence.

Minn., St. James—Mr. Rolf has begun erection of a modern house; cost \$2,000.

Minn., St. James—John Pedvin is erecting a California bungalow, modern throughout; cost \$4,000.



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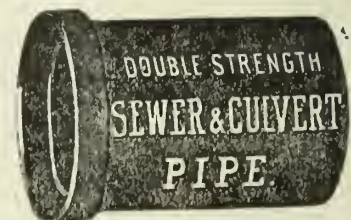
BULLETIN ADS GET RESULTS

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Minneapolis
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Manufacturers of
Sewer Pipe Culvert Pipe
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Flue Lining Wall Coping

Iowa Pipe & Tile Co
DES MOINES, IOWA

Iowa, Albia—N. E. Kendell is building a modern residence.
Iowa, Algona—Fire destroyed the residence on the F. S. Norton farm.

Iowa, Ames—R. F. Costigan is erecting a 7-room house. Audubon—W. S. Sheets has commenced erection of a dwelling. Alton—St. Joseph's parish has voted to erect a priest's house. Cushing—Charley Heilman has commenced work on erection of a 4-room cottage. Elk Horn—Work is progressing rapidly on Walter Gregerson's house. George—Jacob Burns is erecting a concrete block residence. Jacksonville—A. H. Hansen will build a new house. Jefferson—Johi Peter Johnson will build a modern house. Kirkman—A. D. Ames is building. Leghorn—C. Fulton will build a modern house. Mt. Carmel—Mrs. Juliana Julich is contemplating erection of a residence. Royal—Joe Giel is building a new residence. Sioux City—Plans and specifications have been submitted to contractor for new residence for F. M. Pellitier; cost \$6,500.

Iowa, Keokuk—Foundation is being laid for an 8-room house for Geo. Ferguson.

Iowa, Marion—Jos. Milner will build a modern residence; Fred Rowe, contractor.

Iowa, Plymouth—A. J. Lantz is building a house for A. C. McLeod.

Iowa, Spencer—J. M. Bergemen is completing a modern residence, 26x32, cement porch in front, steam heat.

Iowa, Storm Lake—Mrs. Maggie Davis is building a new house.

Iowa, Waverly—Geo. Ebert has contract for erection of a modern 2-story residence for the Orphans' home.

Iowa, Wesley—J. L. Andrews is building a modern residence.

Minn., Atwater—Louis Nordin will build a concrete house next spring.

Minn., Campbell—Fire damaged the residence of the Wolvenweber farm; loss about \$400 or \$500.

Minn., Duluth—Fire damaged the residence of W. N. Ryerson, about \$1,500.

Minn., Fergus Falls—A modern dwelling is being built for Chris Nodale.

Minn., Fergus Falls—S. C. Rugland plans to build a modern residence in spring.

Minn., St. Peter—Martin L. Ostby has begun work on a residence.

Minn., St. Peter—Al J. Potts & Co. have contract for installation of heating plant in J. A. Bode's house.

Minn., Staples—Fire damaged the residence of J. D. Marlin to extent of \$1,100 to \$1,200.

Minn., Williams—Art Peterson is building a new house.

Minn., Worthington—R. G. Davis has foundation laid for a new cottage.

Mont., Hamilton—Fire destroyed the residence of Lee Leonard; loss about \$2,500.

Mont., Hardin—Thomas Larson is building a modern house.

Neb., Bayard—Frank Schram will build a modern residence.

Neb., Belmont—Mrs. Abbet will soon erect a new house.

Neb., Cody—Arthur Allen has begun erection of a house.

Hooper—Geo. E. Nelson is building a new house. Kearney—W. F. Crossley has begun work on Louis Hayward's house.

Hastings—Will Schiffers is building a new house. Omaha—Permit issued to Nat Meister for a dwelling, cost \$1,500.

W. T. Gaghebin dwelling, cost \$3,500. Pierce—Work is progressing rapidly on the home of A. J. Mastalir and F. H. Fix.

Plainview—Nels Christiansen is building a new house. Syracuse—H. E. Litsey will build at once a new house.

Wynot—Work has begun on Catholic church, parsonage. Wood River—Henry Schwartz is building a modern residence.

Waterloo—C. A. Obert will build a house. Syracuse—H. E. Litsey will build a modern residence.

Plainview—Nels Christiansen will build a new house soon. Pierce—Work is nearing completion on the homes of A. J. Mastalir and H. F. Fix.

Hastings—Will Schiffers is building a modern residence. Oshkosh—Thos. Farrens will build a house for H. L. Meeker.

Hooper—eGo. E. Nelson is building a house. Bayard—Frank Schram will build a house.

Neb., Creighton—John Green Sr. is erecting a new residence, Jas. Riddle, contractor. Fremont—W. G. Luhrs has laid foundation for a new residence, 2-story, modern.

Fairmont—W. W. Prescott is drawing plans for an 8-room bungalow, for J. M. Carr. Greenwood—A new house will be erected by Ross Nichols soon, W. S. Allen, contractor.

Kearney—Foundation has been completed on Ray Turner's new house. Lincoln—Permit issued to L. J. Brinegar for a dwelling, cost \$1,000.

Henry Ostermiller dwelling, \$1,000. Lewellen—Tom Barrens has commenced work on Howard Meeker's house.

Linwood—Haveney Bros. are planning to erect a large modern house. Norfolk—Lester Parker is constructing a modern 5-room bungalow.

Norfolk—R. Fishback will erect a house. Osceola (Hackberry item)—A modern house is being erected by Geo. Beebe.

Oshkosh—W. J. McIntosh is building a modern house, 14x38 for J. F. Schirmer.

Plainview—Nels Christiansen is erecting a modern house. Raymond—L. A. Simmons is erecting a residence. Red Cloud—A. Holverson is erecting a dwelling; W. J. Scrivner is excavating for a residence. S. Sioux City—W. V. Steuterville is building a house in Homer. Salem—Work is progressing rapidly on house of Addie Sides. Tobias—Carpenters have commenced work on erection of dwelling for M. E. parsonage. Silver Creek—H. J. Graves will begin erection of a dwelling soon. West Point—Contractor A. L. Simonson is figuring on several prospective residences to be built in spring. Wilber—Stanley Bartes is building a residence.

Neb., Potter—Oscar Stewart is building a modern house. Plattsmouth—Peters & Richards, contractors, are erecting a modern cottage. Peru—J. H. Dillon is building a farm residence. Red Cloud—Mr. Beezley is building a new house. Red Cloud—C. E. Strong is erecting a dwelling. Sioux City—W. V. Steuterville is building a modern house, in Homer. Thedford—Work is progressing rapidly on Frank Wickhams' residence. University Place—F. B. Robinson will soon erect a modern residence. Uehling—The Hartwig residence is nearing completion. West Point—P. M. Moodie broke ground for a modern residence, 32x40, 2-story and basement, hot water heating plant, oak finish. Waterloo—A. C. Jensen is having a house built, cement block construction, L. C. Christman, contractor. Palmyra—M. T. Ramsey will build a residence. North Platte—Work has begun on residence for Mrs. Mary E. Watts. North Platte—F. F. Briggs is planning to build a modern bungalow. Kearney—Lou Hayward is erecting a modern bungalow. Hartington—Fred Aglor is building. Fairmont—W. W. Prescott is drawing plans for an 8-room bungalow for Dr. J. M. Aurora—C. W. Lakin is building a new bungalow. Bladen—Geo. Ross has begun erection of a concrete block house.

Mont., Great Falls—Permit was issued to Thomas Stritt for a 1-story frame bungalow at 1206 7th av. N., cost \$2,200.

Neb., Omaha—W. R. Dalbey received permit for erection of a residence, cost \$2,000; P. C. Cramer for dwelling, \$2,000.

N. D., Bismarck—Fire burned the \$5,000 residence of J. Oscar Boek.

N. D., Fessenden—Contractor W. Horska is building a residence for John Klindworth.

N. S., St. John—The modern residence of F. Martineau was burned.

S. D., Flandreau—J. A. Smith is building a modern cottage.

S. D., Gamble—The house of Chas. H. Bates was burned; loss several thousand dollars.

S. D., Howard—Henry Demplewolf contemplates erection of cottage.

S. D., Spearfish—W. W. Wood is excavating for a new residence.

S. D., Tyndall—A modern cottage is being erected for Victor Wagner.

Wash., Spokane—Permit was issued to Mrs. Caroline Clark, 1008 Ermina av. for a 1½-story frame residence; cost \$1,500; also to Albert Bolks, 1002 Ermina av., for alterations of residence, \$175.

Wis., Appleton—The home of August Schafelke was burned, loss \$1,000.

Wis., Lancaster—Fire destroyed the residence of Carl Bloom.

Wis., Madison—The University Avenue Building Co., have applied for permit to build a 3-story apartment house; cost \$32,800.

Wis., Madison—Edith Van Wald has applied for permit to erect a bungalow, cost \$2,800.

Wis., Menomonie—Fire destroyed the home of L. E. Standish.

Wis., Milwaukee—The McGoeth Real Estate Co. are planning to erect 8 frame dwellings during the winter.

Wis., Milwaukee—Philip Valley will erect a \$30,000 apartment house on Junction av., 45x106, solid brick construction.

Wis., Milwaukee—Jacob Hasebhus is erecting a duplex flat building cost \$6,000; W. H. Shennor Co., will erect 15 dwellings, on 64th and 65th av. in the spring; cost from \$2,000 to \$2,500.

Wis., Mondovio—A new house is being erected for James Gleason.

Wis., Neenah—Harry Bishop is building a modern residence.

Wis., Oconto—Fire destroyed the five buildings on property of J. Mann; loss about \$2,000.

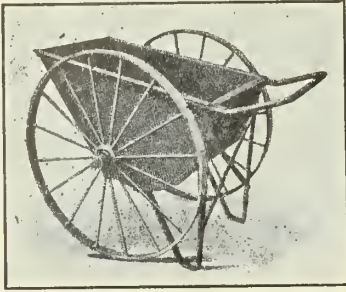
Wis., Spencer—C. Stoltzenow is building a modern residence.

Iowa, St. Charles—The Hart-Parr Co. has under course of construction 20 concrete houses, for its workmen.

Wis., Superior—Permits were issued to R. W. Runions, for a \$4,000 dwelling at 1115 N. 17th st. and Christ Nelson, 1914 21st st. and A. G. Fee, at 1628 Hughtitt av. for residences.

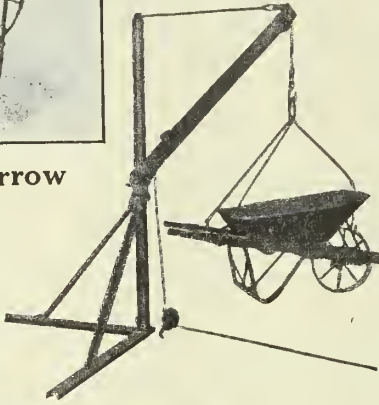
Wis., Superior—Fire destroyed the Catholic parsonage at Solon Springs.

CONTRACTORS' NECESSITIES



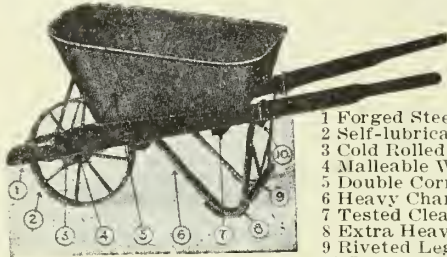
Rayco Wheelbarrow Derrick

Easy to set up and move. Constructed the same as power derrick, but is operated by steam, gasoline or other power. Equipped with an automatic stop to prevent the boom from swinging. Weight of complete derrick, 225 pounds. Capacity 1,500 pounds.



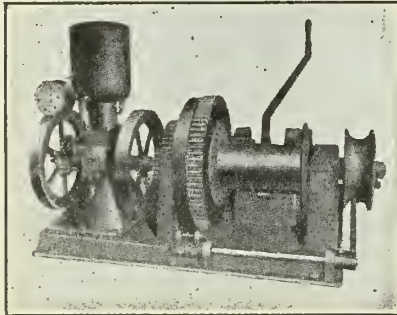
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Capacity 6 cubic feet, thin sloppy concrete; 7 feet dry material. No weak spots. A perfect cart. Weight, 215 lbs., 36-inch wheels.



Concrete Wheelbarrow

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- 2 Self-lubricating Wheel
- 3 Cold Rolled Steel Shaft
- 4 Malleable Wheel Supports
- 5 Double Cornered Riveted Trays
- 6 Heavy Channel Steel Legs
- 7 Tested Clear Maple Handles
- 8 Extra Heavy Leg Shoes
- 9 Riveted Leg Braces
- 10 Patented Handle Clamps

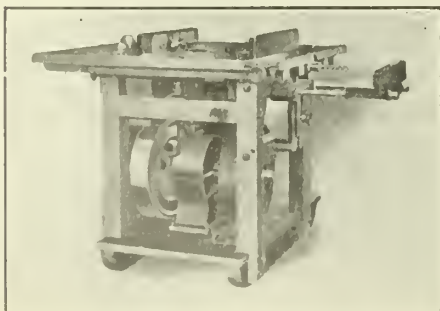
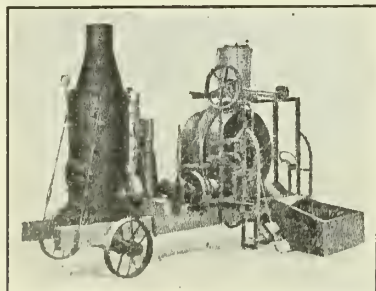


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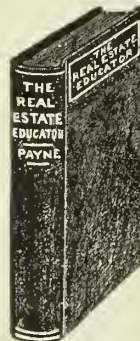


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THE IMPROVEMENT BULLETIN, Minneapolis

NEW PATENTS.

The following patents were issued this week to Minnesota and Dakota inventors, as reported by Williamson & Merchant, patent attorneys, 925-933 Metropolitan Life building, Minneapolis, Minn.: Jos. Bellis, St. Paul, Minn., hose supporter; Axel W. Carlson, Minneapolis, Minn., thermally-released check valve; Bennie Dahl, Brantford, N. D., draft attachment; Curtis W. Davis, Donaldson, Minn., grain drill; Meine P. Freiborg, Driscoll, N. D., washing device; Francis E. Hufnail, Minneapolis, Minn., making a medical composition; Louis A. Jiraneck, Minneapolis, Minn., sanitary baby dresser; Knute C. Likness, Lankford, S. D., gearing; Edward McCauley, Minneapolis, Minn., pole tip; Charles H. Robinson, Deadwood, S. D., guard for smoking pipes; Isreal A. Roshon, Worthington, Minn., attachment for linotype machines; Arvid Seari, Duluth, Minn., railway tie plate; George H. Smith, Reliance, S. D., car door; Edward Weist, Ludden, N. D., detachable teeth for gear wheels; Albert Veitl, Deadwood S. D., combined plapler, pulverizer and weed destroyer.

INDUSTRIAL PROGRESS

NEW LIGHT EFFECTS.

The modern science of lighting has brought out the peculiar fact that it is possible, with simple lighting effects, to change the size and shape of rooms, so far as the effect on the eye is concerned. Thus a narrow room with a high ceiling can be made to look wider, with a lower ceiling; and a big, wide, low-ceilinged room can be lighted so that the ceiling seems a foot or more higher than it really is.

The effects are made with indirect lighting or semi-indirect lighting. Semi-indirect lighting provides for a certain proportion of the light from a chandelier to come directly down from the fixtures and another part of the light to strike the ceiling above the chandelier and so be reflected back down through the room.

An expert recently told the New York section of the Illuminating Engineers' Society that bright light on the ceiling will give the effect of raising it a foot or two. Thus a wide, low room can be improved with light on the ceiling. For a narrow, comparatively high room, such as a bathroom or a hallway, the best effect will be obtained by keeping light off the ceiling and sending it against the walls, thus giving the effect of throwing the walls back.

IMPERVIOUS CONCRETE FROM DENSE MIXTURE.

According to tests recently made by the U. S. bureau of standards, Portland cement mortar and concrete may be made practically impervious to water up to a head of 40 feet without the use of waterproofing compounds, if proper care is taken in selecting the materials and if the concrete or mortar is so handled as to obtain a dense mixture. The mixture should be wet enough for the particles, when puddled, to flow into position without being tamped, and should be well spaded against the forms to prevent the formation of pockets on the surface. It was found that the addition of waterproofing compounds did not compensate for poor materials or poor workmanship.

NEW FIREPROOF COMPOUND.

J. W. Aylsworth, the inventor of "Condensite" and for many years associated with Thomas A. Edison in research work, having devised a method by which chlorine can be permanently combined in the molecule, has put on the market a new substance that opens up a wide field for use in building construction and building management. These are known as Halowax Oil and Halowax. They are chlorine substitution products, having the unique properties of non-inflammability, high boiling points and a wide range of melting points.

Possible application of this new material in building construction and management lies in the fact that the melting of the solid and waxy substances varies between 140 degrees Fahrenheit and 275 degrees Fahrenheit. The boiling point varies between 500 degrees Fahrenheit and 750 degrees Fahrenheit. This makes them exceptionally good insulators for electricity, testing on the average of 250 volts per mill in a thickness of 200 mills thick when molten. When in the fluid or molten state, they are of a very low viscosity and readily impregnate cellular tissues and bodies.

In fireproofing wood floors this material is readily absorbed and these bodies are said to become non-inflammable from defective insulation. It has a strong appeal for use in stack and roofing paints. This material is manufactured by the Condensite Co. of America, Glen Ridge, N. J.

NEW PATENTS.

The following patents were issued this week to Minnesota and Dakota inventors, as reported by Williamson & Merchant, patent attorneys, 925-933 Metropolitan Life building, Minneapolis, Minn.: Hans J. Aune, Crookston, Minn., plow; Simon Belanger, Warroad, Minn., traction plow; Peter Berg, Enderlin, N. D., threadless hose coupling; Herman J. Boelter, Litchfield, N. D., colter cleaner; Charles Danielson, Cannon Falls, Minn., folding combined wash bench and ironing board support; Wm. C. Dennie, Litchfield, Minn., clothes tongs; Chas. M. Erickson, Clarkfield, Minn., means for attaching draft bars to sleigh runners; John Hauenstein, Jr., New Ulm, Minn., cigar and cigarette holder; Agande McDonald, Central City, S. D., broom attachment; Leonard O. Pillsbury, Crocker, S. D., emergency windlass for automobiles; John Reznitch, Cloquet, Minn., heel cushion; Arthur L. Runyan, Huron, S. D., advertising display mechanism; Jos. W. Shumate, Minneapolis, Minn., fly chasing attachment for doors; Albert H. Siemen, Appleton, Minn., gang frame attachment for driving harvester from traction engines; Lucy Styve, Albert Lea, Minn., head and arm rest; Harry M. Thoreson, Yankton, county near Irene, S. D., mechanism to prevent stripping of transmission gears; Chas. J. Miller, Minneapolis, Minn., store service apparatus.

CONCRETE MIXERS

The mixers described and illustrated here are in almost every case the latest models as they will be manufactured and sold in 1914. It has been impossible for The Improvement Bulletin to put to actual test the claims made for every mixer. For our information about each mixer we have gone straight to the man who knows most about it, namely, its maker. Practically all statements made can be backed up with letters from users. Prices on all mixers can be secured direct from the manufacturers at the addresses given. The manufacturers of the mixers described will be taken up in alphabetical order, according to the name of the company.

NAME—HARTWICK CONCRETE MIXER.

MANUFACTURED BY—HALL-HOLMES MANUFACTURING CO.

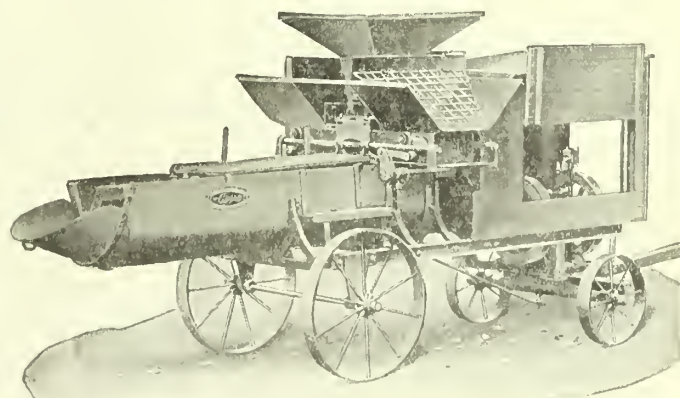
ADDRESS—JACKSON, MICH.

LOCAL AGENT—WAGNER-LANGEMO CO., 418 N. 1st st. Minneapolis, Minn.

The Hartwick Mixer manufactured by the Hall-Holmes Co. of Jackson, Mich., has several points that make it well worth consideration by the contractor. First and most important, the process of mixing is one. The manufacturers say:

"The mixing is done in a double mixing trough. Patent No. 807207, Dec. 12, 1905. This trough, as shown by accompanying cut, has two sets of mixing flights which revolve in opposite directions to each other, throwing all material toward the center, from one set of flights to the other, the flights always being under and lifting up and cutting through, instead of simply crowding along. This is a very important matter in the continuous mixer. The ordinary mixers with a single trough and one shaft use paddles of the mould board type, which simply turn the material over a few times and auger it out, the same as it went in, without thoroughly mixing. On all our machines we use a straight flight set on quarter angle which cuts through the material and separates it into small particles, giving the cement a chance to unite with the other material. With the double mixing trough we guarantee an absolutely perfect mix before any water is added and afterwards, whether the concrete is wanted medium dry for tamping or so it can be poured into forms. As the material is discharged from the proportioning hoppers it drops into the center of the mixing trough and is passed the entire length of same, mostly between the two mixing shafts. On account of the manner in which the material is handled and the width of mixing trough, which is twenty-six inches wide and made of heavy steel boiler plate, there is no trouble in keeping it clean, as it practically cleans itself.

They make the double trough Hartwick mixer in several sizes, also a single trough continuous mixer and the machines may be equipped with steam or electric power.



NAME—GRAND MIXER.

MANUFACTURED BY—HALL-HOLMES MANUFACTURING CO.

ADDRESS—JACKSON, MICH.

LOCAL AGENT—WAGNER-LANGEMO CO., Minneapolis, Minn.

The Grand No. 1 is mounted on steel I-beam frame with steel trucks, steel axles 1 1/4-inches in diameters, straight spindle, steel wheels 20 inches in diameter for the front, 30 inches in diameter for the rear 3/4x3-inch tires. These wheels are electric weld tire and spokes with cast steel hub 5 inches long. The feeders are 12 inches wide and made of 14-gauge steel.

(Continued on page 47.)

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PORCH CAPITALS—In classic and modern designs, all standard sizes, and waterproof material.

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Mortar Water-proofing Compound. Atlas Composition Flooring,

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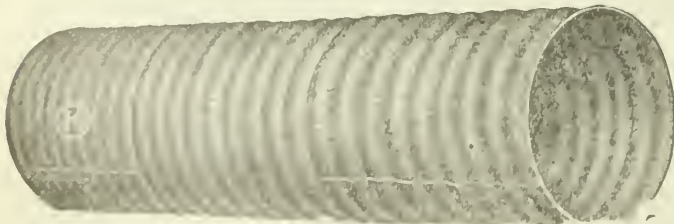
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St. Paul --:-- Minn.

NATIONAL TECHNICAL AND TRADE SOCIETIES, AND MEETINGS.

American Society of Civil Engineers. Secretary, Charles Warren Hunt, 220 W. 57th st., New York. Meets first and third Wednesday, except in July and August.

American Institute of Electrical Engineers. Secretary, Frederick L. Hutchinson, 29 W. 39th st., New York. Meets second Friday.

American Society of Mechanical Engineers. Secretary, J. C. Olsen, Polytechnic Institute, 39th st., New York.

American Institute of Mining Engineers. Secretary, Bradley Stoughton, 29 W. 39th st., New York.

American Electric Railway Association. Secretary, H. C. Doncker, 29 W. 39th st., New York.

American Highway Association. Secretary, J. E. Pennybacker, Jr., Colorado building, Washington, D. C.

American Institute of Architects. Secretary, Glen Brown, Washington, D. C.

American Institute of Chemical Engineers. Secretary, J. C. Olsen, Polytechnic Institute, Brooklyn, N. Y.

American Institute of Consulting Engineers. Secretary, Eugene W. Stern, 103 Park av., New York.

American Public Health Association. Secretary, Selskar M. Gunn, 755 Boylston st., Boston, Mass.

American Railway Association. Secretary, W. F. Allen, 75 Church st., New York City.

American Railway Bridge and Building Association. Secretary, C. A. Lichty, 262 Jackson boul., Chicago, Ill.

American Railway Engineering Association. Secretary, E. H. Fitch, 900 S. Michigan av., Chicago.

American Road Builders' Association. Secretary, E. L. Powers, 150 Nassau st., New York.

American Society of Engineering Contractors. Secretary, J. R. Wemlinger, 11 Broadway, New York. Meets second Thursday, in New York, except in July and August.

American Society for Municipal Improvements. Secretary, A. Prescott Folwell, 50 Union Square, New York City.

American Society for Testing Materials. Secretary, Prof. Edgar Marburg, University of Pennsylvania, Philadelphia, Pa.

American Water Works Association. Secretary, J. M. Diven, 47 State st., Troy, N. Y.

American Wood Preservers' Association. Secretary, F. J. Angier, Mount Royal Station, Baltimore, Md. Convention, Jan. 20 to 22, 1914, at New Orleans, La.

American Road Builders' Association. Annual convention, First Regiment Armory, Philadelphia, Pa., Dec. 9-12. E. L. Powers, secretary, 150 Nassau st., New York City.

American Society of Municipal Improvements. A Prescott Folwell, secretary, 50 Union Square, New York City.

Association of American Portland Cement Manufacturers. Secretary, Percy H. Wilson, Land Title building, Philadelphia, Pa.

Association of Engineering Societies. Secretary, Frederick Brooks, 31 Milk st., Boston, Mass.

Canadian Society of Civil Engineers. Secretary, Clement H. McLeod, 176 Mansfield st., Montreal. Meets Thursdays, in Montreal, except during the months of May to September, inclusive.

International Association for Testing Materials. Secretary, Ernst Reitler, Vienna, Austria.

National Association of Cement Users. Secretary, Edw. E. Krauss, Harrison building, Philadelphia, Pa. Tenth annual convention, Feb. 16 to 20, 1914, at Chicago.

National Electric Light Association. Secretary, T. C. Martin, 29 W. 39th st., New York.

National Fire Protection Association. Secretary, Franklin H. Wentworth, 87 Milk st., Boston, Mass.

National Drainage Congress. Vice president, Edmund T. Perkins, First National Bank building, Chicago, Ill.

National Paving Brick Manufacturers' Association. Secretary, Will P. Blair, Brotherhood of Locomotive Engineers building, Cleveland, Ohio.

New England Water Works Association. Willard Kent, secretary, Narragansett Pier, R. I.

Illuminating Engineering Society. Jacob Israel, secretary, 29 W. 39th st., New York City.

American Highway Association. J. E. Pennybacker, secretary, Washington, D. C.

League of Pacific Northwest Municipalities. Charles G. Haines, secretary, Walla Walla, Wash.

United States Good Roads Association. John H. Bankhead, president; J. A. Rountre, secretary, 1021 Brown-Marx building, Birmingham, Ala.

National Municipal League. Clinton Rogers Woodruff, secretary, 705 North American building, Philadelphia, Pa.

Paint Manufacturers' Association of the United States. Secretary, Geo. B. Heckel, The Bourse, Philadelphia, Pa.

American Road Builders' Association. E. L. Powers, secretary, 150 Nassau st., New York City.

CONCRETE MIXERS --- Continued.

The engine is mounted on a large casting which gives it a good foundation and eliminates any possibility of getting out of alignment. The power transmission is furnished in either gear or chain drive. Is furnished with tongue of ample length and the engine is well housed from dirt and dust. The mixing trough is of No. 8 gauge steel 6 feet 6 inches in length.

The company also make a No. 2 and No. 3 Grand and these machines, as well as their Grand Mortar Mixer, are covered by a liberal and reasonable guarantee.

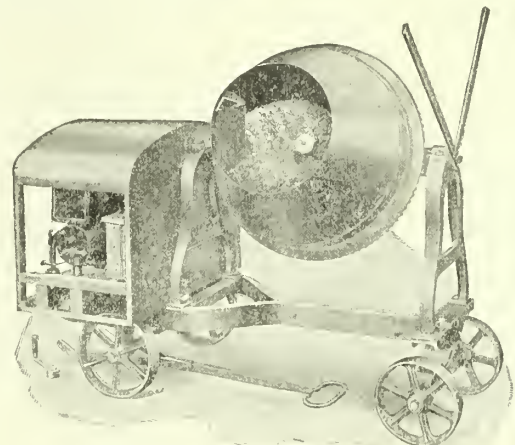
NAME—BIG-AN-LITTLE CONCRETE MIXER.

MANUFACTURED BY—JAEGER MACHINE CO.

ADDRESS—COLUMBUS, OHIO.

The "Big-an-Little" concrete mixer, manufactured by the Jaeger Machine Co. of Columbus, Ohio, is designed to meet the requirements of the building contractor who would find a large machine too expensive for him to use.

Many contractors who use large mixers on large jobs employ old hand-mixing methods on small jobs, but experiments conducted on the strength of concrete machine-mixed for varying periods indicate that the materials must remain in agitation with the water for at least a full minute. The tendency to rush the work is not productive of good concrete, and should consequently be curbed. In general, machine-mixing, where carefully controlled, is superior to hand work, since fatigue of the workmen has no influence upon the thoroughness of mixing.



The Big-An-Little Concrete Mixer.

With the sub-grade or sub-base properly prepared and with good materials correctly proportioned and thoroughly mixed, the assembling of these in a manner which will result in a permanent structure should not be neglected. The concrete should be deposited and tamped into final position within the forms on the sub-grade or sub-base, previously wet, as quickly as possible. With the Jaeger mixer a sixth yard is used, taking two wheelbarrows per batch.

This mixer being of medium size, is not too large for the ordinary small job, and yet a number of these machines on the large jobs can be operated more efficiently and economically than a large mixer requiring a large gang. Whenever too many workmen are placed in too close a condition, some must always wait for others to get out of the way. There is invariably more or less confusion, and loss of time means a leakage in cost.

The mixer is operated by a 2½-horsepower engine. It will turn out amix offrom 4to 6 cubic feet per batch at a gasoline cost of from 3 to 4 cents per hour. It is exceedingly simple in construction, having but two discharge levers and three mixing plows in the drum. On all medium-sized jobs this type of machine saves from \$3 to \$18, as compared with hand-mixing cost.

NAME—KENT PRECISION MIXER.

MANUFACTURED BY—KENT MACHINE CO.

ADDRESS—KENT, OHIO.

The important point emphasized by the makers of the Kent Precision mixer is that the value of a concrete mixer depends on its ability to accurately measure and proportion

(Continued on page 49.)

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BUSINESS INFORMATION

In this section will be found information relating to new devices and methods of construction; also mention of late catalogues issued by manufacturers of building materials and equipment.

Any catalog mentioned here can be seen at the office of The Improvement Bulletin, 912 Lumber Exchange, Minneapolis, where a complete file is kept.

A good idea, to insure attention to their catalog, is used by G. L. Simonds & Co., 115 S. La Salle, st., Chicago. They attach to the cover of their book describing Vulcan Soot Cleaner a slip telling the importance of the book and of the information it contains. In this way, the contents will be read instead of being overlooked. Page after page of diagrams show how the Vulcan may be applied to water tube and return tubular, boilers thus removing soot and reducing the coal bill.

A sample piece of the Morgan Door is sent to those interested, free. Not the whole door itself but a cross section which shows the exceptionally strong construction of the door and its good features. This little sample is accompanied with a catalog of standard sash, doors and millwork and the two form a strong combination in pulling business. A stair work catalog is also gotten out by the same concern, the Morgan Co. of Oshkosh, Wis.

The Penberthy Injector Co. of Detroit, Mich., whose claim is that their goods have been meeting the test for 25 years, gets out an ideal catalog, clear, artistic, interesting and yet with prices plainly given in a way that one can understand. The many Penberthy specialties among which are the famous injector, regarding brass valves, oil and grease cups, water gages and cellar drainers, are all described and pictured. The catalog will be sent free on request.

Tanks are very interesting, when you know how to make them so. The Chicago Bridge & Iron Works manufactures a very complete line of steel water tanks and tells about them in a way which will surely attract your attention. Just get the catalog from the company at Chicago, and look it over. Here are water tanks of all kinds, page after page of photographs showing them in actual use, and complete descriptions explaining them. Then there is a list of Chicago tanks in use, by states, giving the name of the company using each one and the capacity of the tank. Besides this, they get out a disquisition on the subject of tanks, which, we say frankly, we do not care for, but which has many funny pictures in it. Another little folder gives the names of the many railroads now using Chicago water tanks. The tank book is well worth looking over.

Gas water heaters, storage heaters, automatic heaters, tank heaters and house heaters are all manufactured by the Hoffman Heater Co. of Lorain, O., and are described in various circulars they publish. They are short, easy to read, explain in a few words, the good points of the Hoffman heaters and besides carefully drawn pictures, show sizes and prices.

"What Chicago Thinks of the Clow Bubble Drinking Fountain" is the name of the little booklet of Jas. B. Clow & Sons, of Chicago, Ill. It is very clear to see that the Windy City approves of the fountain, from the picture on the cover, of three sturdy Chicago policemen on Michigan av. waiting their turns at the drinking place. Clow fountains have been installed in the Chicago city hall, on the shopping streets, in the parks and in the schools. Better write for this booklet and look it over.

A big, handsome book is "Derricks" published by the Terry & Tench Co., of New York, to describe their line of derricks, and derrick fittings and contractors' equipment. A big photograph in the front of the book shows the Manhattan bridge in process of construction. It pictures erection of the suspended floor system as it proceeded in each direction from the towers. The line includes guy derricks, stiff leg derricks, hand power guy derricks, jinniwinks, hoisting engines, derrick fittings and erection tools. The catalog is printed on heavy plate paper and is well worthy a good place on your bookshelf.

SWAMP DRAINAGE.

Congressman A. J. Volstead's suggestion that the legislature make direct appropriation for the improvement of the state swamp lands from the proceeds of the sales of such lands will be recommended by Governor A. O. Eberhart in a message to the legislature of 1915. While the constitution in general terms prohibits the state being a party to internal improvements, Mr. Volstead is certain that an exception is made regarding such lands as come to the state by special congressional grant as is the case with the swamp lands.

CONCRETE MIXERS --- Continued.

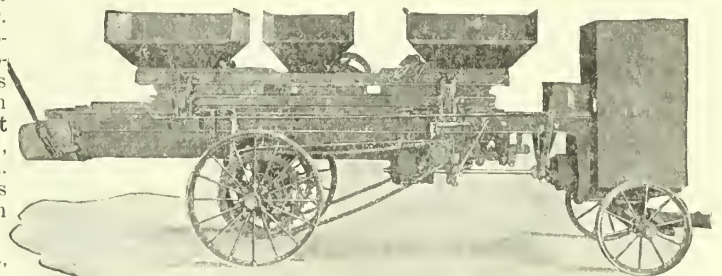
the aggregates and then mix and deliver them rapidly and well to the workmen. It is claimed for the Kent that it lives up to its name in every way by measuring and delivering the aggregates with absolute precision, using a mixing process that thoroughly does the work. A description of the measuring device follows:

"The bottom plate of the hopper moves while the hopper remains stationary. At each forward movement, as many cubic inches of material are carried out as can pass through the opening. At the return movement, this material must necessarily fall, as other material has settled down in the hopper, preventing the return of the aggregates. The amount of the discharge at each movement is determined by the size of the opening, which can be regulated at will.

"For regulating the size of the opening, a gate is provided, furnished with an indicator scale. By moving it to the desired position, the discharge opening is altered accordingly. If, for example, you wish to mix 1:3:5 concrete, you set the indicators of the hopper accordingly, and will get precisely this combination. The openings can be changed while the machine is in motion by simply shifting the indicators—an operation requiring less than half a minute; further, if required, we can equip the gates with locks so that they cannot be tampered with or changed except by some one in authority having keys.

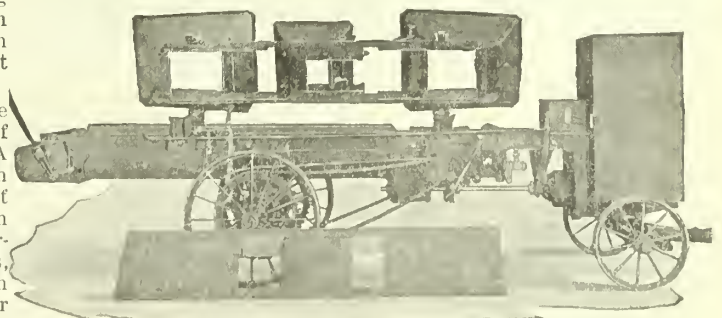
"The hopper, which is made of heavy steel plate, has no agitators, pockets, or any other devices to the sides of which damp material can cling or that can in any way affect accuracy of measurement, nor do we use feeding devices of the 'worm' or 'screw' type."

The company makes Kent Portable Precision Mixers in several sizes and the Kent Precision Mixer No. 15, is their leader. It has a capacity of fifteen cubic yards of rammed concrete per hour.



Kent Precision Mixer No. 15.—Front View.

This type is adaptable to all kinds of work. The machine shown has three hoppers, the one at the right for sand, the one in the center for cement and the one at the left for stone. Outside the hoppers and just above the framework are shown the scales and indicators.



Kent Precision Mixer No. 15.—With Hoppers Tilted Back.

The hoppers are hinged on the side opposite the operator, so that by simply disengaging the hooks on the operator's side, they may be turned over and the feed plate removed without the use of tools. This operation takes less than sixty seconds and completely exposes the mixing trough and operating mechanism.

By simply loosening the nuts on four bolts, the entire mixing shaft can be removed from the mixing trough.

(To be continued Jan. 10.)

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(Each week in this space will appear a letter from different prominent contractors telling of experiences with "Carney's Cement" mortar.)

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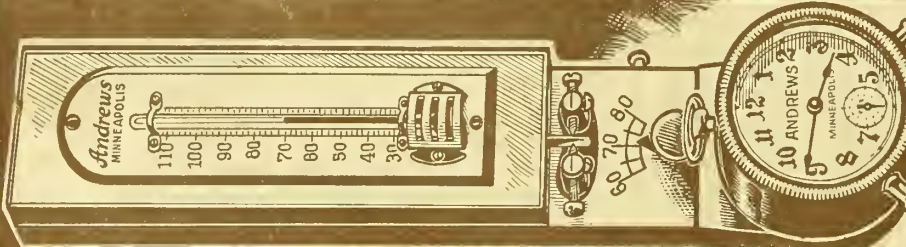
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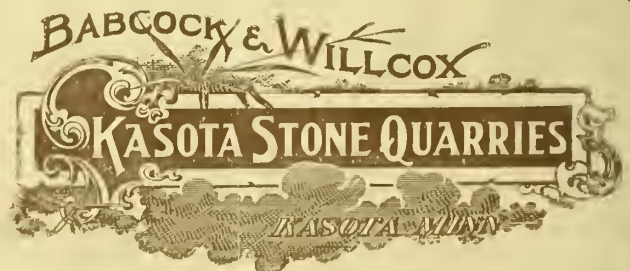
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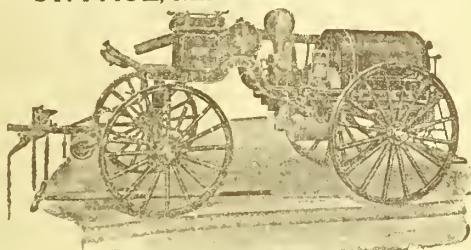
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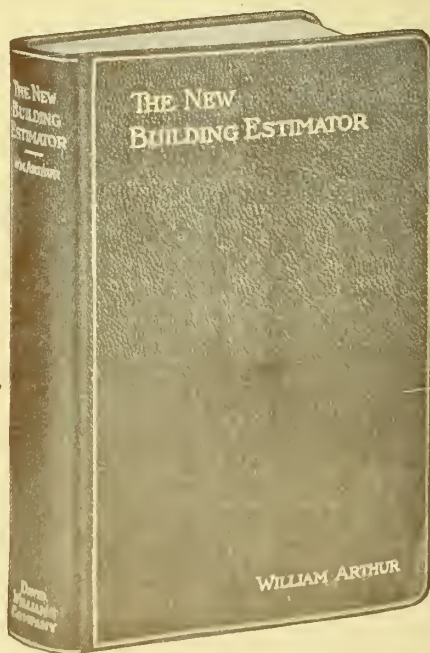
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FOUNDED BY HAROLD C. CHAPIN

VOL. XLVII

SATURDAY, JANUARY 10, 1914.

NO. 6

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2	Inland Steel Co., St. Paul.		SLATE BLACKBOARDS.	
	SLATE BLACKBOARDS.		Twin City Tile & Marble Co., Minneapolis.	
	SKYLIGHTS.		STEEL—BARS	
51	Krieger-Jamar Co., Duluth.	2	Inland Steel Co., St. Paul.	
24	St. Paul Roofing, Cornice & Ornament Co., St. Paul.	6	Minneapolis Steel & Machinery Co., Mpls.	
34	R. S. Wishart & Co., Minneapolis.		STONE.	
	STEEL—BARS	52	Babcock & Wilcox, Kasota, Minn.	
	STONE.	48	Biesanz Stone Co., Winona, Minn.	
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	TANKS—STEEL.	48	Breen Stone Co., Kasota, Minn.	
6	American Bridge Co., Minneapolis.	48	Edw. Edinger Co., Cedar Rapids, Ia.	
52	Central Supply Co., Minneapolis.	1	Ingalls Stone Co., Bedford, Ind.	
0	Minneapolis Steel & Machinery Co.	48	Kettle River Co., Minneapolis.	
	TERRA COTTA.	51	Duluth Cut Stone Co., Duluth, Minn.	
	VARNISHES.	48	Mantorville Stone Co., Mantorville, Minn.	
10	Gardner Hardware Co., Minneapolis.	48	New Ulm Stone Co.	
52	North Star Varnish Co., Minneapolis.	48	Pioneer Granite Co., St. Cloud, Minn.	
52	Twin City Varnish Co., St. Paul.	48	Sauk Rapids Granite Co., Sauk Rapids, Minn.	
	VALVES.	48	Win. Penn Stone Co., Minneapolis.	
52	Central Supply Co., Minneapolis.	48	The Widell Co., Mankato, Minn.	
40	Crane Co., Minneapolis.		STRUCTURAL SECTIONS AND SHEETS	
40	Crane & Ordway Co., St. Paul.		Inland Steel Co., St. Paul.	
	VAULTS.		TANKS—STEEL.	
16	Diebold Safe & Lock Co., St. Paul.	6	American Bridge Co., Minneapolis.	
16	Heilig & Elliott Co., Minneapolis.	52	Central Supply Co., Minneapolis.	
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	VENTILATING SYSTEMS.		VARNISHES.	
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38	Charles Wilkins & Co., Minneapolis.	52	North Star Varnish Co., Minneapolis.	
	WALL BEDS.	52	Twin City Varnish Co., St. Paul.	
46	Northwestern Bedding Co., St. Paul, Minn.		VALVES.	
	WATERPROOFING		Central Supply Co., Minneapolis.	
10	Gardner Hardware Co., Minneapolis.	40	Crane Co., Minneapolis.	
38	H. W. Johns-Manville Co., Minneapolis-Milwaukee.	40	Crane & Ordway Co., St. Paul.	
16	K. F. Lott & Co., St. Paul, Minn.		VAULTS.	
	WATER TOWERS, STEEL.		Diebold Safe & Lock Co., St. Paul.	
6	Minneapolis Steel & Machinery Co., Minneapolis.	16	Heilig & Elliott Co., Minneapolis.	
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9	Midway Ornamental Iron Works, St. Paul.		WATERPROOFING	
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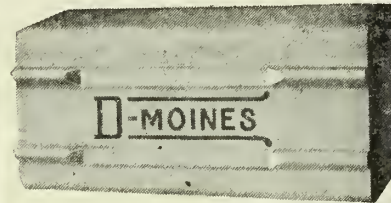
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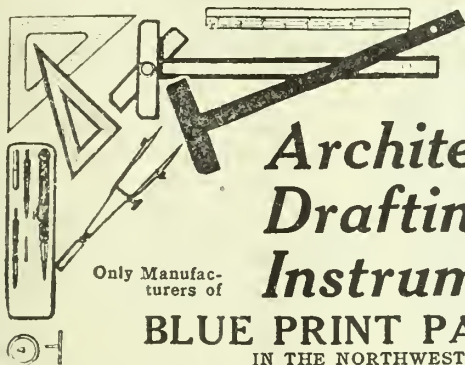
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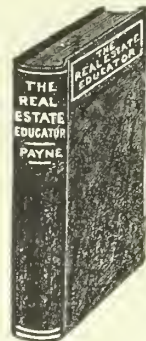
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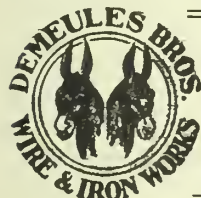
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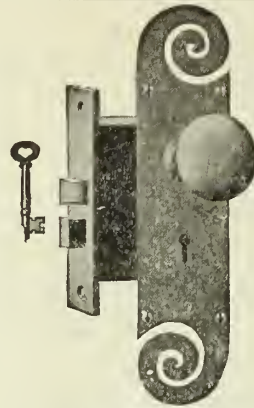
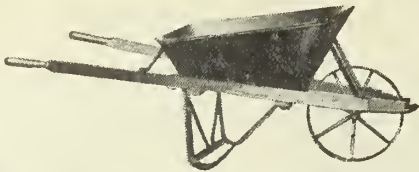
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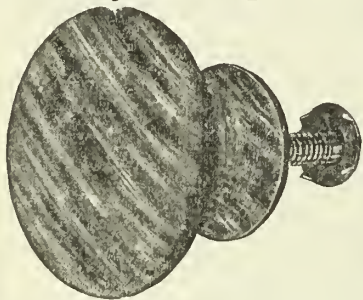
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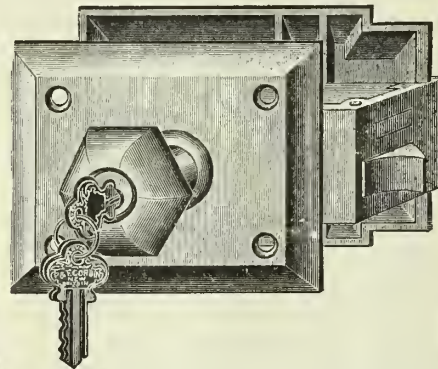
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IMPROVEMENT BULLETIN

VOLUME XLVII.

SATURDAY, JANUARY 10, 1914

NUMBER 6

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EDITORIAL

O. L. COLBURN, Editor

MINNEAPOLIS BUILDERS' EXCHANGE ELECTS.

At one of the largest gatherings in the history of the Minneapolis Builders' Exchange, Tuesday, the following officers were chosen for 1914: President, M. Schumacher; first vice president, John McDonald; second vice president, Jas. H. Brown; treasurer, Leon C. Warner. Directors for three years: E. H. Cobb, Tony Hedborg, J. L. Robinson; sergeant-at-arms, Chas. Fisher; committee on complaints, Aaron Carlson, W. O. Hartig, Harold Johnson, C. F. Splady.

There were 235 meetings of allied interests at the exchange in 1913; 780 plans filed on which 4,671 parties bld.

AN ARCHITECTURAL COLLISION.

Wisconsin's commendable efforts to give its architects a chance to compete for the plans of the Wisconsin building at the Panama-Pacific Exposition in San Francisco next year, have developed trouble. The commission having the building in charge, and the Wisconsin chapter of the American Institute of Architects have not agreed on the manner of conducting the competition for the plans. It appears that the Wisconsin chapter in trying to apply the institute rules, to the competition ran against the authority, and determination, of the commission to be sole judges of the manner of receiving plans.

"The rules of the American Institute are based on experience," said George B. Ferry, a prominent Milwaukee architect, a member of Wisconsin chapter. "For ten years all the work of the U. S. government has been done under them, and as a result American public buildings generally are among the most artistic modern structures in the world. Men who are called upon to act as judges in a contest should be familiar with the subject involved. A shoemaker would not be called in to decide a contest involving medical matters. And I do not think that politicians are qualified to pass on architecture. When the name of the competitor is not written on the plans, so that the judge does not know whose work he is passing on, he is more likely to give an impartial decision than when the name is written on."

A. W. Prehn, member of the commission, announced that the commission would brook no dictation from any institute or society. The law makes the members the sole judges of the plans and leaves them no power to delegate the task to any other person or persons. However, the commissioners will be glad of suggestions from any citizen who may inspect the plans.

"Absolute and effective anonymity is except in rare cases," says the Institute on competitions, "a necessary condition of a fair and unbiased competition. Except in such cases, the signing of drawings should not be permitted, nor should they bear any motto, device or distinguishing mark. Drawings and the accompanying sealed envelopes containing their authors' names should be numbered upon receipt, the envelopes remaining unopened until after the award."

Without doubt the most nearly perfect competition must be conducted as described by the American Institute of Architects.

1914 STARTS BETTER THAN 1913.

After enumerating events which have been regarded as not favorable to business prosperity, the reviewer of the business situation for the Christian Science Monitor says that the business world enters upon the new year with more hope of good times than it did for the year 1913. There is still some uncertainty as to the operations of the new tariff law, but United States business men, true to their reputation for ingenuity and enterprise, are readjusting their affairs to meet the new conditions. There is yet no indication that competition with foreign goods will be serious, for thus far under the new tariff there has been no noticeable inrush of merchandise from abroad. On the other hand, United States manufacturers are developing markets for their wares in other lands that will be of untold benefit in the future. Exports in the last few years have had a wonderful growth. The exports for the year just ended will break all previous records and the probabilities are that the excess of exports over imports will be in the neighborhood of \$700,000,000, by far the largest excess ever reported for a twelve months' period.

Conditions in Europe are improving. There is indication of easier money at the leading centers of the world. Confidence is returning. There is a strong consuming demand for everything that is made or grown. The agricultural outlook is most promising. The mild temperatures prevailing so late in the season have permitted much plowing and the prospects are for a large acreage, particularly in wheat. Soil conditions are excellent. With good crops, easier money, and less political turmoil, the year 1914 offers much that is promising for good business and general prosperity.

New Developments in Transmission Line Practice and Engineering

*By R. A. Lundquist, Consulting Engineer.

In beginning a discussion of new developments in transmission line work, it is perhaps interesting to look into the past a bit. It is only a span of twenty years since the first line transmitting three-phase alternating current for any distance was put into operation. Only twenty years ago was heralded the astounding news that power was being transmitted in this way a distance of eight whole miles. It is a far cry from the pioneer Redlands system of 1893 to the developments at Niagara and Keokuk of today. In the history of the civilization, no other branch of industry and science has shown a development as rapid and as decisive as that experienced in the electrical field in its various branches or in its entirety within the last two decades.

Coming back to the present, and to our subject, we may start out with a general survey of the fundamental tendencies in late transmission line practice. We may first take up the matter of voltage. The Au Sable Power Co., of Michigan, at present has the distinction of having in operation a line built for the highest commercial voltage of the day, 140,000 volts, but they do not now operate at that pressure. The company states that they reduced the voltage to 104,000 volts in order that operating conditions might be more uniform, as they already had in service other lines carrying this latter pressure. As soon as the insulation of this part of the older system is increased they expect to again run the voltage up to 140,000 as standard. Though this line is the only piece of 140,000-volt construction that has seen service, there are probably twenty or thirty lines in the United States and Canada operating at 100,000 to 120,000 volts, with several more under way. In California, the Pacific Light & Power Corporation has now in course of construction a line that is to operate at 150,000 volts, so that when it is placed in service, the maximum commercial operating voltage will have been raised another notch. This 150,000-volt construction will be used between Big Creek, near Fresno, California, and Los Angeles, a distance of about 240 miles. It is announced that three single circuit lines will be erected. The conductors are arranged in a horizontal plane 17.5-foot centers, with a standard conductor clearance to ground of 37.5 feet at the towers; the spans will run from 600 to 700 feet.

It is questionable whether the use of a voltage greater than 150,000 will be demanded for several years to come. From an electrical and from a mechanical standpoint there appears to be no reason why a higher commercial pressure cannot be employed, but the question is, will it be good business. A line that will require a voltage greater than 150,000 volt must necessarily be long and must use large conductors. To give service reliable enough to compete with prime movers at the delivery end, duplicate lines must be built, and in part duplicate apparatus installed. The cost of the line per kilowatt output will be high, so that the fixed charges per kilowatt hour delivered will be heavy. To these charges must be added the expensive maintenance of a long line. It is self-evident, therefore, that the cost of the power delivered to the high-tension line at the station end must be very low in order that a kilowatt hour may be sold in competition with central stations at the consumer's end of an ultra-high voltage line. So, under general conditions, it will appear that such a line will be commercially feasible only where power can be developed very cheaply at the generating end of the line, or where power brings an unusually high price at the delivery end. Of course, the annual and the daily load factors must, in any case, be very high to show earnings on such a proposition.

DETAILS OF A 204-MILE LINE.

While on this phase of the subject it may be well to note that for a 204-mile line to transmit power from the Trolhattan development in Sweden, to Copenhagen, Denmark, where three and a half miles of the distance would be cable work in water, a board of engineers recommended the adoption of the Thury direct current system with ground return against three-phase alternating current. The Thury system was figured to operate at 90,000 volts and the alternating current at 100,000 at 25 cycles. Twenty thousand horsepower were assumed at the generating end of the line.

The frequency of the present system in Copenhagen is 50 cycles, so that frequency changing sets were necessary in both cases. The direct current voltage could be carried through cable, while it would be necessary to lower the alternating current pressure at this point, increasing the losses and requiring more equipment.

A very thorough investigation was made of the proposition, and the final figures showed that the total annual expenses per kilowatt would be \$11.16 for the generation and

transmission of the direct current, and \$15.66 for the generation and transmission of the alternating current, with the power delivered at 50 cycles through a frequency changing set. Also, on the above basis 9 to 10 per cent more power would be available with the direct current than the alternating current with the same amount delivered in each case at the generating end of the system.

The use of the higher voltage lines has introduced several mechanical troubles into the transmission field. Some of these we will take up in discussing the specific details that they involve, but the matter of span length had perhaps better be noted here.

When high-tension lines were first built, wooden poles were always used and the spans were generally never greater than 150 feet standard. As higher voltages were adopted, the cost of insulators per mile of line became a larger and larger item, and longer spans on stronger structures suggested themselves. This resulted in the common use of 400 to 550-foot spans and tower construction, but pin-type insulators were employed. Then followed the introduction of the suspension type of insulators. Higher voltages became more easily obtainable since this type of insulator eliminated the mechanical limitation imposed by the pin-type; with the higher pressure, longer spans were employed as standard.

With the use of four to eight-unit strings of suspension insulators and long span construction, severe trouble was soon experienced from the running of sag, especially when the conductors became unequally loaded with frost, wet snow, or sleet. The conductors would at the start be more or less uniformly covered, but due to the wind or to an increase in temperature, this loading would begin to be dislodged, but not equally, so that one span might be heavily loaded, while that on either side of it would be bare. The result was the deflection of the insulators at each end of this loaded span, in toward it, so that its sag became excessive and the conductor would come in contact, or almost so, with the one beneath or the clearance to ground might be reduced to a dangerous degree. This condition has been experienced in districts in both Canada and the United States, and seems to have been the more aggravated in the case of lines with aluminum conductors, as might naturally be expected.

TESTS OF INEQUALITY OF SAG.

A line of the Washington Water Power Co. gave considerable trouble from this source as soon as it was placed in operation, and quite elaborate tests were made to determine the inequality of sag that would result from various combinations of adjacent span loadings. These are described in a paper by Mr. V. H. Greisser in the Proceedings for September. It may be well to note the result of one of these tests to illustrate the effect spoken of. The line mentioned is carried on towers of the design illustrated, with a standard span length of 750 feet, and the conductors are 270,000 c.m. aluminum cable. A sketch shows insulators used, made up of four 10-inch units, with a string length of 35¼ inches approximately. In making the tests previously mentioned, an experimental line was built with six 60-foot cedar poles set 750 feet apart on a level stretch of ground. The poles were equipped with arms and arranged to carry insulators in the same relative location as on the towers, and pieces of the regular line cable were strung for the test. The conductors were strung with a sag such that their elastic limit would be reached at a temperature of 30 degrees F. with the conductors covered with one-quarter inch of sleet all around and a 60-mile per hour wind blowing at right angles to the line.

The middle conductor of the middle span in the line was given various predetermined loadings by means of bags of rock suspended from it as illustrated in the drawing, and the resultant deflections were noted. The weight of the bags was varied to correspond to the load that would ensue from different thicknesses of sleet on the wires, and the resulting deflections have been plotted against this term in the curve given in Mr. Greisser's paper as shown.

The Washington Water Power Co. is the only company that I know of that has publicly acknowledged trouble of this nature, but as a matter of fact there are several prominent systems that have had crews at work adjusting sags ever since their lines were put into service. The trouble has not necessarily been caused by snow and sleet altogether, as in some cases it has been the result of temperature variations.

There is another feature involving spans that has caused at least one well known system to erect intermediate supporting structures between their original line towers. As this trouble appears to be due to a lack of proper appreciation of the physical characteristics of wire material, it will be treated under that heading.

THE ADVANCE OF A YEAR.

Having discussed the more important general features in transmission practice in which there has been recent develop-

*Paper read before Minnesota Section, American Society of Electrical Engineers.



NEW SALVATION ARMY HOME, ST. PAUL.

Many contributors to the funds of the Salvation Army may see in the above picture how well some of their money is spent. The building is the Salvation Army Rescue Home, Como av. near Como Park and Como Lake, St. Paul. It occupies a commanding position. Passengers on the Como Interurban are frequently heard asking what building it is. The plans for this home were drawn by Chas. H. Johnston, St. Paul, architect of many state buildings and a large number of St. Paul's handsomest structures. In other parts of the country the Salvation Army is building and from time to time will build similar homes. The general contractors of

the St. Paul home were the George J. Grant Construction Co., St. Paul; mill work, Gribben Lumber Co., hardware, Adam Decker, St. Paul; plastering, Geo. Slater, St. Paul; ornamental iron, Herzog Iron Works, St. Paul; cut stone, Ulmer Co.; painting, Bazille & Partridge; glass, Pittsburgh Plate Glass Co.; roofing and sheet metal, Scribner-Libbey Co.; electrical work, Gorman Electric Co.; plumbing and heating, M. J. O'Neill; tile and marble work, Breen Stone Co.; fireproof slate roof, hollow tile partitions and furring, solid brick walls; face and all other brick by Johnson, Jackson & Corning, St. Paul. Cost \$50,000.

ment, we will take up the year's progress along the line of materials and appliances that are used to make up a transmission line.

Differentiating between high-tension distribution lines and high-tension transmission lines, we find the use of steel towers and steel poles becoming more and more general. In tower construction, the rigid type of structure has been employed for most of the heavy truck lines above 66,000 volts, but on the whole the use of flexible construction has shown a marked increase. This appears due, in part I judge, to the fact that electrical men are beginning to realize more keenly that the thickness of the metal used in the shapes of which light and even medium-heavy rigid-type structures are built, does not give the members the life that had been anticipated for them. It has in the past been too customary to assume almost eternal life for a steel line structure, without any regard to the size of its members, or the maintenance given it. The flexible designs ordinarily employed, with their heavy sections, may be expected to give a life more nearly in accord with the depreciation rates that have been assumed by operating companies. The lower first cost of flexible construction, as compared with well designed rigid-tower line, is of course the main reason for its more general use, but for the foregoing is strongly contributory.

The practice in this country is to use a strain tower at intervals of about one mile, or with the spans commonly employed, every tenth to thirteenth structure is of the dead-end type. In Europe, however, it appears that the tendency is to use strain towers at closer intervals, or about two per mile. In a recent European construction, that of the Vesterdalafven Power Co., in Sweden, spans of 655 feet as standard were used, and every fifth tower was a dead-end structure. In Figs. 5 and 6 are shown the intermediate and the anchor towers respectively used in the line just mentioned.

In connection with the Swedish line, just mentioned, it is of interest to note the size of the conductors employed in the 655-foot span work. They were hemp-center cables of 50,000 c.m., a size just a little smaller than No. 3 B&S, and the steel ground wires, two in number were about 5-16-inch

strand. The line wires, in view of the spans employed, are considerably smaller than American practice would dictate for mechanical reasons.

In line with the increase in the use of steel towers, steel poles are also being employed to a greater extent. Companies that have always built towers, are now beginning to submit designs of narrow base structures that are in reality poles. The Southern California Edison Co. recently completed a 60,000-volt double-circuit line where it was found advisable to use for a portion of the way, a steel pole with about a 3-foot spread at the ground line in order to get through valuable ranch property economically. Six hundred and sixty-foot spans were used. The same line, in passing through the streets of Los Angeles for about two miles, was carried on steel poles with an 18-inch base, the poles being about 80 feet overall and set 200 feet apart. The Virginian Power Co. of West Virginia built 115 miles of 44,000-volt double-circuit steel pole line last spring, and are now erecting about 75 miles additional.

CONCRETE AND WOOD POLES.

Concrete poles have not been used for any transmission work of size for some time, though there have been isolated installations of a few miles of such construction. They are, however, still being employed in distribution work to some extent.

Wooden pole construction has shown no new developments in the past year, excepting that butt-treatment is becoming more and more general, and that there is a tendency on the part of some companies to use heavier poles and longer spans than usual. On the other hand one of the originators of this variation from common practice has had considerable trouble with its long-span wooden pole construction, and has modified it to some extent.

Insulators, both pin and suspension types, have lately been a matter of study both from a mechanical and from an electrical standpoint. The effect of high-frequencies on standard designs is being investigated. In tests reported by Messrs. Thomas and Inlay in a paper before the institute last

(Continued on page 47.)

PERSONAL AND GENERAL NEWS.

Doings of the Northwest this Week Boiled Down for Busy Readers

PERSONAL AND GENERAL.

Mankato, Minn. building in 1913 was lively. J. B. Nelson Construction Co. has a long list to its credit, including a bank, churches, theater, garage, plants, commercial structures, including the Standard Oil Co. among its patrons. There is also a good list to the credit of Otto Neittge, including the St. Joseph hospital addition. J. L. Hoy and G. Kleinschmidt also make a prosperous showing.

A. E. Rydlun a Minneapolis contractor is getting actively into business again after interruption due to a trip to Europe last summer. Mr. Rydlun found the competitive system of bidding for general contracts about the same abroad as here. In construction he found a practice of using wood strips instead of metal or mesh for plaster veneering exteriors; skeleton steel construction of large buildings was not so much in use as in this country.

Sioux Falls, S. D., has been selected by John W. Masury & Son, of New York, Chicago, Minneapolis, Kansas City and Detroit, manufacturers of paints and varnishes, as the point from which South Dakota and that section will be supplied. Geo. S. Sheffield, manager of the northwestern headquarters, Minneapolis, has been in Sioux Falls, arranging for the branch. Arrangements have been completed with the Brown Drug Co., of Sioux Falls, to manage the South Dakota branch, which will be operated in connection with Minneapolis.

W. E. Orr, general contractor and builder, plumbing and heating, has removed from Winner, S. D., to Norfolk, Neb., to engage in general contracting. He would like catalogs and price lists of all kinds of building material and contractors' equipment and supplies.

Ft. Dodge Culvert Co., Ft. Dodge, Iowa, has established branch offices at Sioux City, Iowa, and Chicago, Ill.

The Chamberlain Road Machinery Co., Inc., Hutchinson, Minn., is equipped to supply the wants of road officials. They have a complete line of road machinery.

Governor Hanna has announced the appointment of C. A. Grow of Minot as the third member of the highway commission. The governor and state engineer are the other members.

John M. King, contractor, 2119 Mendota st., Madison, Wis., was dangerously wounded in an accident while he was hunting with his son. He was accidentally shot in the leg, severing arteries.

Quantity Surveying was the subject of the recent address by C. A. Wright, architect, at a meeting of the Milwaukee Builders' Exchange and Architectural club.

ARCHITECTS AND ENGINEERS.

C. E. Bell, architect, has removed his offices, temporarily, to 345-351 Auditorium building, and will remain there until Feb. 1, when he will occupy his new permanent quarters in suite 310-12-14 Security Bank building.

La Crosse, Wis.: Announcement is made of the association of Percy Dwight Bentley and Charles Alfred Hausler of St. Paul in a co-partnership under the style of "Percy Dwight Bentley, Charles Alfred Hausler, Architects." The new firm will maintain offices in the Pioneer building, St. Paul, and the Batavian Bank building, La Crosse, the latter the offices already occupied by Mr. Bentley. The arrangement will be in operation January 2, 1914. Mr. Bentley is well known in La Crosse, where evidences of his genius may be found in many modern dwellings and business houses. Mr. Hausler was formerly of the firm of Alban & Hausler, St. Paul, and is widely known in the Twin Cities as an architect of experience and talent.

Mankato, Minn. architects made a good showing of the year's business in a review of 1913 building printed in The Review. Lists of buildings planned by Albert Schippel, H. C. Gerlach and George Pass & Son, were given.

There will be a national convention of mechanical engineers in St. Paul in June according to an announcement of conventions made by John H. Mitchell, chairman of the convention committee of the Association of Commerce.

The annual meeting of the Surveyors & Engineers' Society of Minnesota will be held at the West Hotel, Feb. 24 and 25; with an additional special session Feb. 26, at the headquarters of the Highway Commission, St. Paul, which will be of particular interest to highway engineers. President Danforth has preparations for the meeting well under way, ably assisted by Secretary Forbes.

G. P. Kean, civil engineer on the staff of the Winnipeg Electric Light Co., spent the holidays in Minneapolis.

Edw. R. Ludwig, 147 Ceell st. SE., who has been a draftsman in a number of twin city offices has returned from Europe, after a two years' trip for study.

W. B. Saunders, who was an engineering official at the

Coon Rapids dam for the Mississippi river Power Co., has opened an office in 800 Plymouth building, as civil, mechanical and consulting engineer.

Secretary Ralph E. Smalley announces that the annual meeting of the Gargoyle club of St. Paul will be held at the French building at 6 p. m., Jan. 12. Following the dinner, there will be an illustrated talk by Mr. E. L. Masqueray, on "The Misuse of Precedent in Architecture." The annual election of officers will be held later.

BRICK AND TILE NEWS.

The Centerville Iowa Brick Co. has made arrangements for enlarging its productive capacity during the season of 1914. Superintendent J. F. Pabst was in St. Louis recently inspecting various machines for brick making and reported his observations as the result of which a Garth 5-mould brick press has been ordered by Secretary Edward Shutts from the Illinois Supply Co. at St. Louis, and a 9-foot drying pan has been ordered from the Eagle Iron Works at Des Moines. The installation of these machines will increase the capacity of the plant 25 per cent. Preparations are now being made for the installation of the new machinery, by the laying of foundations, etc., and the machines will be delivered as soon as the preparations are completed. The machinery now in use will be taken out and superseded by the new and there will be a complete new plant.

MONTANA INSTITUTE OF MUNICIPAL ENGINEERS.

The program for the second annual meeting to be held at Great Falls, January 19-21 is as follows:

January 19. Morning—Organization, reading of minutes, secretary's report, president's address. Afternoon—Trip to smelter plant. Evening—Social session.

January 20. Morning—Water Filtration for Montana Cities, M. L. Morris; discussion by members; Everyday Problems, C. E. Durland; discussion by members; Needed Legislation, C. W. Helmick, discussion by members. Afternoon—Trip to the dam at Great Falls. Evening—Social session at Elks' club or Opera House.

January 21. Morning—Sewage Disposal for Montana Cities, A. L. Jaqueth; discussion by members; What I Learned About Good Roads at Detroit, Wm. Jordan, Jr.; discussion by members; Paying, C. C. Widener, discussion by members. Afternoon—Election of officers, talks by manufacturers' agents and paving contractors. Evening—Banquet.

The officers of the society are Henry Gerharz, president; Chas. W. Helmick, vice president; Carl C. Widener, secretary-treasurer. Directors, M. L. Morris, Wm. McLean, Henry Gerharz, Chas. W. Helmick, Carl C. Widener.

NEW YEAR GREETING FROM NEW BUILDING.

The Minnesota Radiator Co. begins New Year with the following interesting greeting: We beg to announce that we are now operating in our new and commodious buildings at Duluth. Our equipment is absolutely modern, our floor space and number of men employed has been more than doubled, and with increased capital we are in a position to assure the "heating trade" generally the very best service, with the further assurance that the high standard of "Minnesota Radiators" will always be maintained.

In appreciation of your favors of the past and in anticipation of those in the years to come, we heartily thank you and wish you a happy and prosperous New Year.

C. B. Bentley is sales manager at the Minneapolis office, 423 Metropolitan block. The Duluth office is in 59th av. W.

MASTER BUILDERS CO. INCREASES LOCAL STAFF.

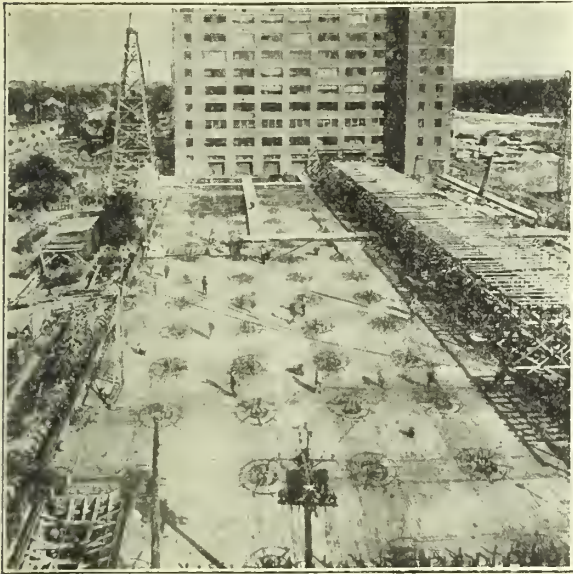
Since Jan. 1, 1914 H. O. Johnson has been associated with the Master Builders Co. as special representative, assisting Mr. H. R. Phillips, district manager, 822 Plymouth building.

Master Builders' Concrete Hardener for use in making cement floors wearproof, dustproof and waterproof is being adopted for all classes of buildings and through the addition of Mr. Johnson to the organization, the field of the Northwestern office will be enlarged and the service to architects and contractors extended.

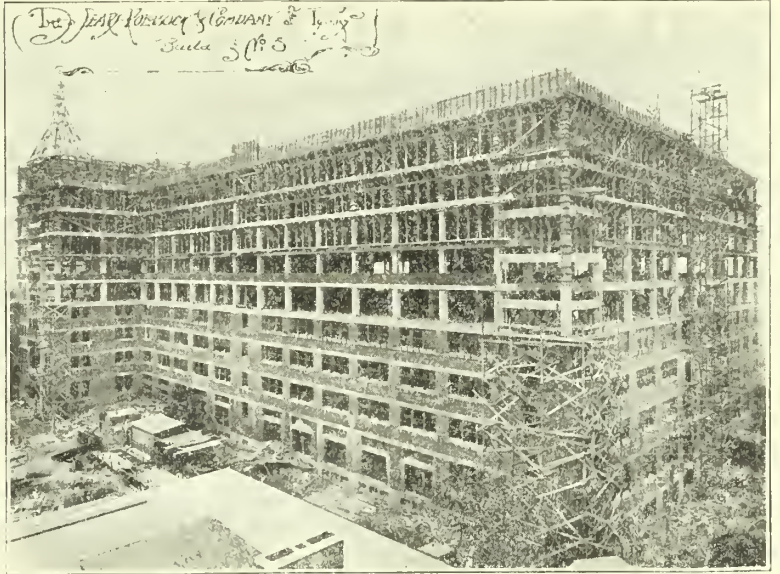
Mr. Johnson will continue to handle the individual lines of builders' specialties he has been offering, with offices at 10 Lumber Exchange, as heretofore.

OPENS MINNEAPOLIS OFFICE.

A local office of the American Cast Iron Pipe Co. was opened Jan. 1, 1914, at 840-841 Plymouth building. All business in Montana, North and South Dakota, Minnesota, Wisconsin and Canada will be handled from this office.



The Reinforcing in Place.



The Building Under Construction.

This big building is a warehouse for the Sears, Roebuck Co., at Dallas, Texas, and is one of the many large buildings built on the Turner Mushroom system of reinforced concrete in Texas. This building is 166 feet by 282 feet in dimension and ten stories high, making a total of about 500,000 square feet of floor area.

STEEL CEILINGS BECOMING POPULAR.

The popularity of steel ceilings is rapidly increasing, and the demand throughout Southern California has been heavy. The California Steel Ceiling Co. of Los Angeles, report large sales during the last few months. Public buildings not only in Los Angeles, but in many of the smaller cities, are being equipped with steel ceilings. The manufacturers have just completed the installation of ceilings in the Masonic Temple of Anaheim, one of the most exclusive buildings in Orange county, and in the Auditorium theater in Santa Ana. Los Angeles' newest and finest firehouse, No. 28, at 7th and Figueroa sts., and Boos Bros.' cafeteria, at Broadway and 7th sts., are equipped with steel ceilings altogether. Other buildings too numerous to mention have installed steel ceilings, and owners of buildings to be constructed have demanded the same. The tremendous demand for this type of ceiling for so many kinds of structures goes to prove its superiority over the common ceiling.

Steel ceilings present a clean, light, sanitary appearance, and are exceedingly beautiful. The cold barrenness of ordinary ceilings vanishes where steel ceilings are installed. They eliminate unsightly cracks prevalent in plastered ceilings, and can be easily washed or painted, making them look like new. For these reasons a great many stores and buildings are installing them.

OF A SOCIAL NATURE.

An unusually pleasant annual dinner was held by the Cochran-Sargent Co., of 186-190 E. 6th st., St. Paul, on Jan. 3, at the Commercial Club. The company was organized Jan. 1, 1912. A feature was "Half-hour Talks" by M. M. Cochran, Howard H. Sargent, George C. Rugg, Boo B. Montgomery, John Cramsie, Harold T. Nyberg, Fred T. Monick, Merrill Briggs and Vincent O'Brien. The "bill of lading" was something different in menus:

Blue points on soap dish, celery pipes, radish ells, consommé a la lard oil, cast iron tenderloin, brass potatoes, assorted fittings, salad with type unyte dressing, trapped ice cream, bronze liquid syrup, assorted lead cakes, bronze icing, "radiator coffee," compression cigars, W. D. bowls and fuller bibs.

The Sales force of the Plymouth Clay Products Co. and the Plymouth Gypsum Co. were entertained at the Waukon hotel, Fort Dodge, Iowa, last week by the officers of the companies. This is the third annual banquet enjoyed by the salesmen of the Plymouth industries and is anticipated each year with a great deal of pleasure. This banquet is the closing feature of a half-week of instruction by the respective sales managers and the talking over of business conditions and prospects. All of the salesmen were greatly interested in the new product of the clay company, the Segmental Sewer Block, and spent some very profitable time at the factory studying its manufacture. This block is a new building ma-

terial in the middle west and the prospects for a heavy sale look very bright even this early in the season. In the gypsum line there have been several improvements added at the factory which promise not only an increased output but also an improved quality of material. Those present at the banquet were: L. E. Armstrong, J. T. Cheney, J. L. Johnson, J. M. Norton, H. J. Osterlund, G. M. Eilenberger, Otto Simonson, H. Anderson, A. J. Armstrong, T. H. Ewing of Minneapolis, M. N. Espey, F. M. Coughill, E. V. McClure, J. T. Garland, E. J. Hedman, T. L. Murphy, T. B. Kershaw and Jno. Heller.

PLANS AT BUILDERS' EXCHANGE MINNEAPOLIS.

Plans on file Jan. 3, 1914, at the Builders' Exchange. Minneapolis: court house, Flandreau, S. D., bids open Jan. 6; holiday election day, Jan. 6; bank Long Prairie, Minn., Jan. 12; club house, Livingston, Mont., no date set; model school, Winona, Minn.

Bids in, not awarded: school, Foley, Minn.; mechanical equipment school, Foley, Minn.; produce house, Swift & Co., Creston, Iowa; postoffice, Mandan, N. D.

Contracts awarded: high school, Montevideo, Minn., H. N. Leighton & Co., Minneapolis; addition Soldiers' home laundry, Minneapolis, Algot Johnson, Minneapolis; Sacred Heart academy, Fargo, N. D., Polson Bros., Chicago; electric construction, power plant, Rochester, Minn., Minneapolis Electric Equipment; piping state hospital, Rochester, Minn., Healey Plumbing & Heating Co.; fire escapes, Rugby, N. D., bids rejected; state sanatorium buildings, Walker, Minn., Hodgkin Construction Co., Sioux City, Iowa, low bidders; mechanical equipment, buildings, Walker, Minn., J. P. Adamson, low bid.

NEW YORK'S NEWEST SKYSCRAPER.

Howells & Stokes will be the architects of the next great tower building in New York, to be called "Trinity Tower," and to stand in Trinity place, opposite the church yard, from which it will have permanent light. The architect of the first really world-famous tower building, the World building, was George B. Post, and within the last decade the names of the Messrs. Le Brun, Ernest Flagg, Henry Ives Cobb and Cass Gilbert have been added to the list of architects of extremely high towers.

PROTECT YOUR STEEL.

Architects should specify a coating or enamel for their steel structures, and thus ensure a long life for the buildings. We see many steel frames going up, not thus safeguarded, which even before erection show signs of rust and deterioration. Too great care cannot be exercised in this respect, as the small additional cost is the cheapest kind of insurance, and experience has proven that steel buildings thus protected have almost an unlimited tenure of life.—Architect and Engineer of California.

CONSTRUCTION & CONTRACT NEWS

OF SPECIAL VALUE TO ENGINEERS, CONTRACTORS, BUILDERS AND MANUFACTURERS

MINNEAPOLIS, MINN.

Office: 912 Lumber Exchange. Phones: N.W. Main 3902; T.S. 2194.
Please telephone news not later than Wednesday.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

G. C. Breyette, 3947 Minnetonka av., 1½-story frame dwl.	2,500
J. C. Lynch, 1516 Brooks av. SE., 2-story plaster veneer dwl.; contract not let.	2,800
Victor T. Peterson, 2916 43d av. S., to complete dwl.	1,500
Katherina Soderholm, 509-11 18th av. SE., 2-story plaster veneer duplex	4,000
C. G. Victorson, 1519-21 3d av. S., 1-story brick veneer store	2,600
F. E. Graves, 2524-26 Nicollet av., 1-story frame addition to store	1,000
North Star Woolen Mill Co., 6th av. S. and 1st st., new floor and concrete beams; Haglin-Stahr Co., builders.	1,500
John Ecklund, 5116 Harriet av., 2-story brick and plaster veneer dwl.	5,960
Nathan Schloner, 1037 N. James av., 2-story plaster veneer duplex; Mandel Bros., builders.	4,200
Henry Trepanier, 3501 Polk st. NE., 1½-story plaster veneer dwl.	1,000
Board of Education, Oak st. and Wash av. SE., 1-story brick add. to Motley School.	2,000
Board of Education, 25th av. and Taylor st. NE., alterations in basement of Prescott School.	24,000
C. B. Westfall, 3126 4th av. S., altering frame dwl. into duplex and alterations.	1,500
H. L. McCoig, 25 E. 48th st., 1-story plaster veneer dwl.	3,800
Hanna Franson, 136 E. 35th st., 2-story plaster veneer store and flat; Gust Lindquist, supt. of construction.	2,200
Andrew Berg, 4701 5th av. S., 1-story plaster veneer dwl.	2,800
J. F. Johnson, 3217 41st av. S., 1-story frame dwl.	1,000
Carl J. Carlson, 3616 11th av. S., 1½-story plaster veneer dwl.	2,500
Louis Hansen, 3721 16th av. S., 1-story plaster veneer dwl.	2,500
S. M. Lee, 5227 12th av. S., 1½-story frame dwl.	1,200
Clyde E. Pratt, 1828-30 Clinton av., 2-story brick veneer flats (4)	10,000
Edna D. and Simon Kruse, 424-26-28 S. 6th st., 1-story brick 3d story addition to building; John S. Homan, builder.	7,000
Frank Sinclair, 9-11-13 N. Wash av., interior alterations in Glenwood hotel; Fred Noren, builder.	8,000
V. E. Freeman, 4736 S. Colfax av., 2-story plaster veneer dwl.; John Atland, builder.	3,500
F. E. Kelly, 739-41 E. 14th st., 1-story brick stores (2).	2,000
Mrs. Mary D. Lewiston, 300-22 W. 28th st., open porches.	2,000
Tron Flittie, 3631 N. Emerson av., 1½-story frame dwl.	1,200
E. H. Broadwell, 1421-23 Hennepin av., electric freight elevator; F. A. Pigeon, builder.	1,400
Reuben Blumberg, 42-44 N. 11th st., alterations to brick flat building; Carlstad Bros., builders.	4,000
M. A. Jordan, 2415 Lake place, 2-story plaster veneer addition to dwl.	3,000
Luther James, 608 Huron st. SE., 1½-story plaster veneer dwl.	2,000
E. L. Bergquist, 4005 Garfield av., 2-story plaster veneer dwl.; Am. Realty & Bldg Co., builders.	5,000
Washington Yale, 96-104 Spruce place, 1-story brick stores (7); P. O. Halladen, builder.	6,000
Peter Lyons, 3608 12th av. S., 1½-story plaster veneer dwl.	2,800

*Bids will be received until 5 p. m., Feb. 10, 1914, for furnishing all labor and material for the following seven separate contracts: General, plumbing, heating, ventilation fan equipment, temperature regulation, vacuum heating system, electric installation, for high school to be built by independent school district of the city of New Ulm, Minn., plans by Tyrie & Chapman, architects, 320 Auditorium building, on file at offices of Clerk of District A. F. Reim, New Ulm, and at architects' offices, also at Builders' Exchanges of Minneapolis and St. Paul. Bids will be opened publicly by school board of said district in the high school building, New Ulm, at 8 p. m., Feb. 10th; plans for contracts for the general work, heating, ventilating, temperature regulation, vacuum heating system and electric installation, will be ready on and after Jan. 10, 1914; for plumbing, will be ready on or after Jan. 17; see official advertisement in the Improvement Bulletin this week for further particulars.

New ownership of the 99-year lease at 6th and Hennepin, southwest corner, has changed the construction plans, and an office building may be erected for some profession. A 100-year lease held by Otto Bremer and others on this corner was purchased by Benjamin Schneider, 2416 Humboldt av. S., Bettingen-Forster Co., assisted in the transfer. There is no present announcement to be made as to what will be done with the site, but it is one of the most desirable in the city and cannot long remain as it is. An office building for special professions of interests is most likely, said a member of the firm.

*Kirby T. Snyder, architect, Plymouth building, is preparing plans for a new school building at St. Francis, near Lake Minnetonka, Minn.; 2-story and finished basement, brick, 89x156, flat roof, concrete foundation, semi-fireproof, oak trim,

maple floor, steam heat, fan ventilation, plumbing, domestic science, and laboratory equipment, deep well supply system, wiring, gymnasium with seats for assembly. F. E. Vrooman, clerk, St. Francis.

G. and G. Overhead Crane Ash Hoist

Was furnished and erected by us this week

At the Gates Mansion

A VERY SUPPLY COMPANY

Clinton V. B. Avery, Manager

SELLING AGENTS

Center 1354—PHONES—Nic. 5229

747 Plymouth Bldg.

Minneapolis

An additional story, 3rd, will be built on the business structure at 424 S. 6th, by Edna D. and Simon Kruse, Hotel Radisson; for John S. Homan; 66x90, brick, \$7,000; plans by A. C. Claussen, architect, Lumber Exchange.

Haglin-Stahr Co., general contractors, Lumber Exchange, are making alterations at North Star Woolen Mill; new floors, concrete beams on outside walls.

*Two big plumbing contracts were awarded recently to E. A. Collinton, 124 E. Lake, in the new C. M. & St. P. R. R. shops; the other contract awarded to Barberry-Fritz, 817 20th av. N. for installation of plumbing and heating in the Ascension school building. The Central Supply Co., in both cases are furnishing the equipments, including their Maxco seat-acting closets and B. O. T. combinations.

Permits for a number of improvements by the board of education were issued this week, day labor, 1-story brick addition, 14x30, Motley school, \$2,000; day labor; alterations in the basement of Prescott school, 25th and Taylor NE., \$24,000, day labor; Wm. Marchbank, clerk, City Hall.

*Plans for a cottage at Worthington, Minn., have been furnished by Glenn L. Saxton, architect, Plymouth building. Owner, L. M. Austin; 22x24, \$2,000; also plans for a rough cast and cement veneer residence at Seward, Neb., for Clemmens Schwabe, 26x28, \$4,000.

Hennepin county will build a permanent highway from Minneapolis via Lake Minnetonka, north to county limits this year, according to present plans, first portion to be finished, will be from Hopkins to Excelsior on Excelsior blvd.

The United Church Hospital association plans to enlarge Thomas hospital, 6th st. and 29th av. S.; superstructure of the Fairview hospital, same location, will be started in spring, total cost \$200,000; Rev. T. Eggen, president.

Committee on the expenditure of \$100,000 under state law for county sanitarium in Hennepin county is composed of J. R. Kingman, Security Bank building, E. C. Gale, attorney, Security Bank building and Dr. J. W. Bell.

H. L. McCoit, Loan & Trust building, is building a 1-story plaster veneer dwelling at 25 E. 48th, 28x41, concrete foundation, hot water heat, electric light, mantle, hardwood throughout, leaded glass; cost \$3,800, day labor.

J. C. Lynch will build a plaster veneer dwelling at 1516 Brook av. SE., 28x18, 2-story, concrete foundation, hot water heat, electric light, hardwood floors and trim, laundry tray, mantle; cost \$2,800, contract not let.

*A new flour mill may be built by L. Christians & Co., millers, on site first bought in west side mill district.

Hanna Franson, 3312 Elliott av., is building a store and flat building at 136 E. 35th, 22x42, 2-story plaster veneer, hardwood trim, plumbing, store fronts; cost \$2,200; Gust Lindquist, superintendent.

A duplex will be built by Katherina Soderholm, 614 19th av. NE., at 509-11 8th st. SE., 24x44, plaster veneer, concrete

foundation, hot water heat, hardwood trim, plumbing, gas, day labor; cost \$4,000.

A 1-story store building will be built by C. G. Victorson, 3332 Elliott av., at 1519 3d av. S., 40x56, brick veneer, stone foundation, hardwood trim, plumbing, gas, plate glass front; cost \$2,600; day labor.

Plans are expected to be ready soon for figuring for the First National Bank and Soo road office building, 16-story, 1st av. S. and 5th st. and work to start May 1 on superstructure.

Bids received by board of education until 2 p. m., Jan. 16, for tables and cabinets, domestic science department; plans at executive agent's office, 407 City Hall; check for \$50.

Options on property have been secured by the Zuhrah Temple Mystic Shriners, who believe that their plans for a new temple which is being voted on will carry.

A synagogue will be built for Temple Shaaritov congregation, at Emerson and 24th S. near Hennepin; cost \$100,000; Emile A. Adelshein, president of the church.

A 4-flat building is being built by Clyde E. Pratt, 2608 Pillsbury av., at 1829-30 Clinton, concrete block foundation, brick veneer, 2-story, 38x57, day labor, \$10,000.

Bids received until 2 p. m., Jan. 13, by board of education, 407 City Hall, for manual training benches; check for 5 per cent; commissioner on building supplies.

C. B. Westphal, 1916 Fremont av. S., is changing a dwelling into a duplex at 3126 4th av. S., frame, front side porches, concrete block foundation, day labor.

Bids received until 2 p. m., Jan. 16 for manual training lockers, specifications on file with executive agent 407 City Hall, board of education; check \$50.

Library board has purchased site at 22d and Central NE. for a branch library; addition will be built to the North Side branch library also; cost \$15,000.

*Contract awarded to E. A. Collinton, 124 E. Lake st. for installation of plumbing in the new C. M. & St. P. Ry. shops.

John Ecklund, 4054 Blaisdell av., is building a brick and plaster veneer dwelling at 5516 Harriet, 20x30, modern, hot water heat, \$5,960; day labor.

Peter Lyons, 3608 12th av. S., will build a 1-story plaster veneer dwelling, 26x28, concrete foundation, hardwood trim, plumbing, gas, cost \$2,800.

Ankney homestead, southeast corner 2d av. S. and 9th st. will be improved by new owners, the Marquette Holding Co.

Sixth Ward Equality club may build a boys' club at Seven Corners; address Frank R. Neivel, Pillsbury settlement house.

All bids rejected for dredging Lake Nokomis, and new bids will be secured by the park board.

ST. PAUL, MINN.

404 Scandinavian American Bank Bldg. Phone: N.W. Cedar 1683.
Mail or telephone news not later than Wednesday.

BUILDING PERMITS.

Alfred Peterson, 404 Case, 2-story frame dwl., Arkwright Lookout place; C. Lindstrom, builder.....	5,000
F. Piska, Gladstone, 2-story frame dwl., Hague near Dunlap; N. G. Person, builder.....	3,500
Mrs. E. H. Stauffacher, 941 Hastings av., 1½-story frame dwl., Fauquier near Kennard; Mrs. E. H. Stauffacher, builder.....	1,000
H. Schaettgen, builder, 754 Hamline, 2-story frame dwl., 774 Hamline near Seminary.....	3,200
W. L. Leonard, 1905 Laurel, 1-story frame and stucco store, Cleveland near Grand; Julius Sholl, builder.....	1,400
Jacob Luthold, repairs brick store, 41 E. 3d st. near Cedar; M. E. Christenson, builder.....	3,000
Carl A. Bredahl, 609 Hawthorne st., 2-story frame dwl., Wright near Greenbrier; Carl A. Bredahl, builder.....	2,700
Cushing & Driscoll, agents, 1-story brick addition to store, 375 Robert st.; Geo. J. Grant & Co., builders.....	3,000
Theo. Schultz, 3-story brick addition to store, 381 Robert st. near 5th; Geo. J. Grant & Co., builders.....	6,000
Elizabeth Haxton, 1851 Goodrich av., 1½-story frame dwl., Goodrich av.; C. L. Haxton, builder.....	2,000
Elizabeth Haxton, 1851 Goodrich av., 1½-story frame dwl., Goodrich near Fairview; C. L. Haxton, builder.....	2,000
Andrew Olson, builder, 592 Sims, 2-story frame dwl., Lawson near Greenbrier.....	4,000
Fred Swanstrom, 1491 Blair, 2-story frame dwl., Van Buren near Albert; Fred Swanstrom, builder.....	2,500
A. Rheault & Son, builders, 196 W. Central, 2-story frame double dwl., Central near Jay.....	3,200
J. G. Edwards, builder, 763 Jessamine, 2-story frame dwl., Ross near Weide.....	5,000
Wm. Stiff, 284 E. Page, 1½-story frame dwl., Gates near Mt. Hope; Wm. Stiff, builder.....	2,000
H. F. Douglas, Chamber of Commerce, Minneapolis, interior repairs, 56 Summit; D. E. O'Connell, builder.....	6,000
Jos. Levy, 1-story brick addition to store, 199 E. 7th near Jackson; St. Paul Building Co., builders.....	3,500
Mary A. Ahlgren, 1½-story frame dwl., Edmond st. near Lexington; Home Building Co., builders.....	3,200

Hennessy Construction Co., Oppenheim building, no have contract for the Service building, St. Joseph college, Dubuque, Iowa, have awarded sub-contracts; face brick, Twin City Brick

Co.; steel, E. J. Voggenthaler Co., Dubuque; mill work, Carr-Rider & Adams, Dubuque, including glass; roofing and sheet metal, Minnesota Roofing & Cornice Works, St. Paul; cement, Standard Lumber Co., Dubuque; painting, Paul T. Presley, Dubuque; lumber not bought; basement nearly finished; plastering, Michael Rapp, Dubuque; electrical work, C. H. Kelly, Dubuque.

The Monarch Co., theater constructors and furnishers, have the plans and specifications and contract for building and furnishing the new auditorium for Messrs. Frellson & Frellson at Waukesha, Wis., and will be in the market for common brick, white tile brick, velvet face brick, steel, lumber, asbestos roofing, mill work, etc., and H. J. Hanson will be at the Schlitz hotel, Waukesha on or about the 11th of January to receive bids on same. Building over all will be 50x160, 2-story and basement, with full stage loft.

The New Merchants and Miners State Bank of Ironwood, Michigan, will remodel their bank building and entirely equip the interior with a modern banking room. Contract has been let to A. Moorman & Co., St. Paul. There will be a new granite front. Interior will have Italian marble counter wainscoting, tile floor, ornamental plaster, cornice and beams; indirect lighting fixtures, decoration in oil colors, etc. Cost of improvement, \$10,000; work to be completed April 1.

New theater the first in South St. Paul, cost about \$35,000, is planned by St. Paul parties in a corporation; county attorney R. D. O'Brien, Otto Rath, manager Gaiety theater, J. J. Flynn, former owner of same, Gates A. Johnson, Jr., assistant city building inspector, are mentioned as members; sites being considered; further announcement within a week; to be fireproof, seat 1,200, vaudeville.

Alfred Peterson, 404 Case, is building a 2-story frame dwelling on Arkwright near Lookout place; 28x50, concrete foundation, hot water heat, electric light, hardwood floors and trim, mantle, laundry tray, sleeping porch, sun-room, book-cases tile bath; cost \$5,000; Claus Lindstrom, builder, 1553 27th st.

Peter J. Linhoff, architect, Germania Life building, is preparing plans for a residence at Garfield, Minn., for James Lanigan; 2-story, frame, modern, hot water heating plant; dynamo for electric lights, brick fireplace, book cases, hardwood throughout.

Peter J. Linhoff, architect, Germania Life, will have the plans for the 3-story brick department store at Fairmont, Minn., for Wolff & Haben ready in a few days, steam heat, passenger elevator, patent store front, contract let by owners at Fairmont.

Mary A. Ahlgren is building a 1½-story frame dwelling, 24 x28, hardwood throughout, hot water heat, plumbing, gas, \$3,200, on Edmund, between Lexington and Dunlap; Home Building Co., 412 Pioneer building, contractors.

Andrew Olson, 592 Sims, is building a 2-story frame dwelling, 26x46, on Rawson between Greenbrier and Walsh, hardwood floors, and trim, electric light, gas, sleeping porch, sun-room laundry tray, mantle; cost \$4,000.

N. W. Stuart, 2720 University SE., Minneapolis, is building a 2-story stucco flat building, 35x50, hardwood throughout, hot water heat, plumbing, wiring, laundry trays; cost \$4,500, Edmund between Snelling and Asbury.

F. Piska, Gladstone, is building a residence on Hague between Dunlap and Griggs, hardwood throughout, electric light, gas, laundry tray, fire place, hot water heat, cost \$3,800 N. G. Person builder, 1231 Dayton.

Fielding & Shepley, general contractors, University av., will erect a factory on University near Curfew; to employ about 300 hands, nature to be announced later; real estate deal by Vaughan Realty Co.; 207 foot front on University; cost \$100,000; plans in progress.

Geo. J. Grant Construction Co., N. Y. Life building, have contract for remodeling an addition of 1-story brick store at 375 Robert, between 5th and 6th for Cushing and Driscoll, agents; cost \$3,000.

A 2-story frame dwelling is being built by H. Schaettgen, 754 Hamline on Hamline between Seminary and Capitol; 26x 28, concrete foundation, hardwood floors and trim, plumbing, wiring; cost \$3,200.

Gust Johnson, Margaret st. is building a 1½-story frame dwelling, 24x30, hardwood trim, plumbing, gas, \$2,500; Minnehaha between Duluth and Frank; John Peterson, 761 7th st. builder.

Bids for the proposed greenhouses at Como park received by park board, were referred to Superintendent Nussbaumer, Twin Construction Co., North Ponawanda, N. Y., was low at \$53,750.

H. F. Douglas, Chamber of Commerce, Minneapolis, is making extensive interior repairs in 3-story brick flats at 56 Summit; cost \$6,000; D. E. O'Connell, 301 Selby, builder.

Harry Sansby, 800 University, is building a 1-story brick store, 40x60, store front, flat roof, plumbing, hardwood floor, cost \$2,500; Chas. J. Andreen builder, 388 Iglehart.

Carl A. Bredahl, 609 Hawthorne, is building a frame dwel-

ling on Ivy between Greenbrier and Payne; 22x42, frame, hot water heat, hardwood trim, plumbing, \$2,700.

L. G. Edwards, 763 Jessamine is building a 2-story frame dwelling on Ross near Washington 26x45, concrete foundation, hot water heat, all modern; cost \$5,000.

C. P. Abbott and Wm. Constans, owners of frontage on Robert near Carling's cafe will build a \$40,000, 2-story brick block after Robert st. widening.

Hedman Bros. will make improvements to cost \$20,000, for Hedman Department Store, at 916-20 Rice; Ole Hedman, president, 925 Park av.

Wm. Stiff, 284 E. Page, is building a frame dwelling on Gates between Mt. Hope and Harvey, 22x26, hardwood trim, plumbing, gas, \$2,000.

A double dwelling is being built by A. Rheault & Son 196 W. Central, 2-story, frame, 20x40, hardwood floors, plumbing, gas; cost \$3,200.

Family hotel is proposed for Laurel and Western, St. Anthony hill, Mrs. J. L. Creelman former manager of Angus hotel interested.

Fred Swanson, 149 Blair, is building a 2-story frame dwelling, 26x28, \$2,500 on Van Buren near Albert, hardwood trim, plumbing, gas.

Theo. Schultz is adding to store at 381 Robert between 5th and 6th, 3-story brick, 20x50; Geo. J. Grant, Construction Co., contractors.

W. P. Davidson will build a 3-story business block, at 4th and Robert, beginning about May 1, after Robert st. widening.

New store for Mannheimers on site of Cathedral will have a block frontage on St. Peter, 9-story; cost one million and a half.

Joseph Levey, 460 Rice, is adding to 1-story brick store, at 179 7th; 21x40, hardwood floors, store front; cost \$3,500.

Jacob Leuthold is making alterations and repairs in front of 3-story brick store building 850 Aurora; cost \$3,000.

Hamm Brewing Co. has announced plans for a new cafe on Robert st.

Fire damaged the premises at 304 Rice, \$2,000.

MILWAUKEE, WIS.

Office: Hathaway Building. Telephone: Main 1827.
Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

A. P. Bour, 768 Farwell av., dwl.....	4,000
Savings & Investment Co., Bartlett av. S. of Kenwood, dwl.....	3,800
Juneau Hotel, Wisconsin and Cass st., canopy.....	1,000
R. J. Wussow, 35th and Cherry sts., two flats, each.....	5,200
Gust Ludwig, 940 17th av., cottage.....	1,000
H. J. Newman, 696 Farwell av., flat.....	5,000
Martin Sanderson, NW. cor. Madison and 26th av., flat.....	4,000
Milwaukee Gas Light Co., Corcoran av. near Jefferson, alterations.....	8,000
J. F. Dahlman, 27th and Wright st., flat.....	4,700
Albert Damman, Burleigh between 33d and 34th, flat.....	4,500
James Du Mez, 26th, south of Auer av., cottage.....	3,000
Hugo Duester, 417 Prairie st., warehouse.....	30,000
Scranton Stockade, 42d near Vliet, bungalow.....	3,600
Gross Coal Co., 1st and Canal st., shed.....	25,000
Barney A. Wunk, Rusk and Linebarger terrace, flat.....	4,000
John Etzius, 25th st. near Pase, bungalow.....	2,500
Mrs. M. Martin, 1309 11th st., flat.....	5,500
Grossman & Ida Groizesky, 517 Galena st., apartments.....	5,500
C. F. & A. L. Co., SE. corner Downer av. and Concord, store and flat.....	7,000
F. Charles, SE. corner Downer and Orchard av., two stores and two flats.....	7,000
H. J. Roemer, Chestnut st. near 32d st., flat.....	7,000

The directors of the Wisconsin Telephone Co. at the meeting held here in the offices at 185 5th st., approved of construction estimates amounting to \$300,000, mostly underground work, to be spent in Milwaukee, Eau Claire, Madison, Beloit and other cities. The old "Main" exchange, 426 Broadway, will be remodeled and a new structure erected on adjoining property, 424 Broadway, replacing the present building with a 5-story, fireproof structure on a 10-story foundation. This matter will be decided on at the March meeting. Geo. C. French is district commercial manager, 185 5th st.

Architect Stanley F. Kadow, 988 Kinnickinnic av. will take bids Jan. 20, for the erection of a residence on 2d av., between Grant and Becher sts., for John Pikulik. To be of frame construction, with brick foundation, measuring, 26x30. The same architect is ready for bids on a residence and garage for Mr. Franzen. The former will measure 44x67 and the latter 26x59, both of solid brick construction; bids close Jan. 17 in all lines of the building trade, hot water heat, slate roofing, plate and art glass.

W. H. Shennors & Co., 378 National av. will take bids Jan. 12 for the erection of the following buildings: 32d and 33d avs., between Scotland and Garfield, 3 bungalows, 26x28; residences, 22x36; duplex flats, 22x38; all frame construction. On 64th and 65th avs., 15 dwellings, all frame construction and 22x36, costing between \$2,000 and \$3,000. 37th and Scotland

avs., 40 cottages and dwellings, all frame construction, costing between \$2,000 and \$3,000; cottages 24x44 and dwellings 22x36.

Architects Leenhouts & Guthrie, 424 Jefferson st., are now at work on plans for the proposed new \$500,000 Milwaukee county house of correction, on Hopkins road near North Milwaukee. Plans will provide for a group of structures clustering around the administration building, 52x108, with two wings, 48x33; concrete and fireproof materials will be used in construction; vacuum system of steam heating, ventilating system and sewage disposal tanks are included.

Architects Brust, Phillip & Heimerl, 82 Wisconsin st., are taking bids for the heating in the large addition to the Ed. Schuster & Co., department store, 4th st. and Garfield av., costing \$200,000. The same architects have awarded the plumbing in the Philip Saxe department store at 6th av. and Mitchell st., to be occupied by the Schuster Co., to F. C. Kuetemeyer. Other work previously noted; cost \$250,000.

Architect Charles W. Valentine, 428 Jefferson st., has awarded the following contracts for erecting a bungalow at Storey Hill for Mr. Streckewald; Oman Nelson, carpenter work; Hansen Construction Co., mason; Julius Gauger, plaster; C. T. Goese, sheet metal; Stock & Lohry, plumbing; Marvel-Spencer Heating Co., heating; J. Schaffer, painting.

Architects Martin Tullgren & Sons, 133 2d st., will take bids Jan. 15, for erecting a 12-apartment flat building at Grand av. and 32d st., to be 55x130, concrete and brick; costing \$55,000. Oscar Brockman, owner. The same architects will at the same time take bids for the same owner on a similar structure at Prospect av. and Webster place.

Architect Walter Neuman has awarded contracts for erecting a duplex flat for George Adams, Caswell block, to be erected on Farwell av.; carpenter, Wm. F. Johnston; mason, Smeaton Construction Co.; plumbing, Michael Mueller; sheet metal, Henry Pluckhahn; heating, H. R. Wentworth; electrical, A. R. Merten; painting, Ed. Wiese.

Architects Siebert & Bruecker, 557 12th st., are taking bids on the painting of the office building for Dr. Wm. Gillespie, Grove st. and National av., other contracts on which have been previously noted. These architects will soon take bids on erecting a four apartment flat on Cold Spring av.

The A. Gettelman Brewing Co., 42d and State sts., has filed an amendment to its corporation articles increasing the capital from \$80,000 to \$560,000. The concern contemplates erecting several new structures to increase the size of the plant and its business. Adam Gettelman is president.

The Worden-Allen Co. has been awarded the contract for steel work on buildings A and B of the additions to the plant of the Aluminum Goods Manufacturing Co., at Two Rivers, Wis., C. H. Tegen, Manitowoc, architect, will open bids for automatic sprinkler system this month.

Architects Siebert & Bruecker, 557 12th st., have awarded additional contracts on 2-story, 28x56, brick veneer duplex flat for Wm. Black, 11th and Burleigh sts. Henry Ranscht, general contract. Art glass awarded Wagner Bros., cut stone, W. Erdmann; others noted.

Architect Hugo Miller, M & M Bank building, is taking bids this week for remodeling the store of Ben Rosenberg at 6th av. and Mitchell st. To include a new iron, brick and terra cotta front, 45 feet wide, with copper store front and new plate glass; cost \$5,500.

The board of school directors, 10th and Prairie sts., are taking bids this week for doing certain electrical work, plumbing and furnishing metal lockers at the social centers to be established in the Clark st. 5th st. and 37th st. schools; Frank M. Harbach, secretary.

The Plankinton Packing Co., Muskego av. and Canal st., has filed an amendment increasing its capital stock from \$250,000 to \$2,000,000. The business is to be rearranged and extensive improvements made to the plant; H. C. Carr, manager.

M. G. Peters, 1072 26th st. and F. C. Schultz, 2433 Meinecke av., are taking bids for the erection of a building at 27th and Center sts.; to be of brick, 108x90, with vacuum heating and modern equipment and contain 3 stores and 16 apartments.

The Chicago, Racine & Milwaukee Transportation Line will begin work soon on its proposed new warehouse and office at Erie st. and Broadway; sheds to occupy dockage space of 130x443; improvements to cost \$100,000.

Architect Carl Barkhausen, 121 Wisconsin st. has awarded the excavation and steel work on the new bakery of the M. Carpenter Baking Co., on 7th st., near Sycamore st., to P. H. Murphy and The Heil Co., respectively.

The Stumpf & Langhoff Co., clothiers, are contemplating erecting a new business block, with stores and offices, at 12th and Walnut sts. The site was acquired some time ago and building plans are now materializing.

Architects Siebert & Bruecker, 557 12th st., have awarded the contracts for erecting a duplex flat for Mrs. M. Martin at 1309 11th st.; mason, Martin Construction Co.; carpenter, Henry Rauscht; cost \$5,500.

Architect Leon M. Gurda, 920 2d av. has awarded in addi-

tion to contracts previously noted the carpenter work on 1-story, 48x82, store building for Felix Skupski, 549 Mitchell st., to Stanley Prazynski.

A site has been donated by G. A. Carroll on Atkinson av., for a proposed new German Catholic parish building; Rev. Bernard Traudt is chancellor of the archdiocese. The matter will be taken up soon.

J. F. Fisher, 712 28th st., has the general contract and will do the carpenter work on the residence of H. J. Brandt, now under construction; to be frame and stucco, 2-story and basement and cost \$4,500.

The Savings & Investment association is erecting a residence on Bartlett av., of frame construction, 2-story and basement, 28x30, costing \$3,800; also duplex at 4th and Harrison avs., \$2,600.

Architects Van Ryn & De Gelleke, Caswell block, will take bids Jan. 17 for the construction of the new Normal school at River Falls. To be brick and fireproof, 98x134, costing \$110,000.

Architect Richard E. Oberts, 353 National av. will take bids Jan. 12, for the erection of a duplex flat, 24x52, frame, on S. Pierce st., between 21st and 22d avs.; owner's name withheld.

The State Concrete Block Co. has the mason work on a new duplex flat for Joseph Woppert, on 27th st., between Burleigh st. and Auer av., costing \$3,000.

Architects E. Brielmaier & Sons, University building, are working on plans for a new church, to be erected at Kaukauna, Wis., at a cost of \$50,000.

Peter Schemenauer has the general contract to erect a duplex flat for H. J. Newman; to be frame, 2-story and basement, 26x54; cost \$5,000.

Wm. F. Johnson is erecting a dwelling on Farwell av., near Linnwood av., A. P. Bour, 28x30, costing \$4,000; mason, Riesen & Wilke.

HEAD OF THE LAKES

Office: 206 Manhattan Building Telephone: Auto 3036.
Mail or telephone news not later than Wednesday.

DULUTH.

Items Marked with Asterisks Not in Daily Sheets.

BUILDING PERMITS.

W. J. Sullivan, alterations, 55th av. W. near Raleigh.....	1,000
Nels Backstrom, frame dwl., W. 6th st. near 21st av.....	2,500
Diebel Bros., alterations to church, 57th av. W.....	2,500
K. Lindstrom, frame dwl., Morningside park.....	1,500
G. E. Eagling, frame dwl., Sussex av. near Myette.....	5,000
Comstock Lumber Co., frame lumber shed and planing mill, Main st.....	3,000
G. T. Fafling, frame dwl., Sussex av.....	5,000
Charles Landre, frame dwl., Morningside Park.....	1,000
N. Olmquist, two frame dwls., 59th av. W. between Ramsey av. and Grand av.....	4,000
Annie Wiley, 12th av. E. near 9th, frame dwl.....	1,500
J. F. Nelson, 19th av. E. near 5th st., frame dwl.....	3,000
Gustafsin & Olson, E. 4th st. near 20th av., frame dwl.....	4,000
N. O. Sundby, E. 6th st. near 13th, remodeling rink into dwl.....	1,500
John Norgard, 39th av. W. near 4th st., frame dwl.....	1,500
Western Rug Co., 63d av. W. and Grand av., fireproof factory.....	65,000
H. Thur, Morningside park, frame dwl.....	1,000

Among the new industries and plants planned for the year 1914, the following are conspicuous by reason of their size: Capitol Elevator Co., new 2,000,000-bushel grain elevator to cost \$600,000; Mesaba Boiler & Manufacturing Co., to build new plant in west end; Zenith Furnace Co. to increase capacity of coal docks at West Duluth; Duluth Corrugating & Roofing Co., to erect large factory at Halifax st. and 49th av. W.; M. A. Hannan & Co., to construct coal dock in West Duluth; new coal and lime dock for the Duluth, Missabe & Northern railroad; new wholesale warehouse for Kelly-How-Thomson Co.; new wholesale warehouse for Gowan-Lenning-Brown Co.; two new theaters on Superior st.; possible completion of steel plant.

Outside of 1910, when they were swelled to \$13,305,889 by the passing out of a \$10,000,000 permit to the Minnesota Steel Co., building permits in Duluth during 1913 set a new high record, being 1505 in number, with the value of improvements placed at \$4,026,011. This compared with 1,183 permits in the previous year with improvements estimated at \$2,680,343 makes an increase of \$1,345,468.

St. Luke's hospital is seriously inconvenienced by a shortage of linen as a result of a fire which gutted the laundry, causing a loss estimated at \$400 on the contents and \$700 on the building, partly covered by insurance.

There are said to be practically no empty houses in the city and according to real estate men extensive building is bound to follow.

Four Duluth contractors are understood to have put in

figures on the state sanitarium, to be built at Walker, Minn., at an estimated cost of \$200,000.

SUPERIOR.

Extensive interior decorations at the club's Board of Trade building headquarters were decided upon at a meeting of the newly organized Commercial club house committee. Redecorating, changes in the office section and other alterations are planned; according to the terms of the club's lease these improvements are to be made by the owners of the building.

WINNIPEG, MAN.

The following building permits were issued: E. M. Sheidow, dwelling, Strathcona st., \$2,000; E. Gyrel, dwelling, Rosser av., \$3,000; S. A. and H. Sigurdson, an apartment block, Landside st., \$90,000; P. Clemens, architect, has drawn up plans; two dwellings, Pine st., \$5,000 by H. Birkhill.

O'Brien, Fowler & McDougall Bros. of Ottawa, were awarded contract for ties, for Greater Winnipeg water scheme for bid of \$136,000; the Benz, Richardson Co., of Winnipeg, were awarded contract for telephone poles for \$3,371.

A fire destroyed the premises of the Winnipeg Tanning Co., Ltd., Nairn av., Elmwood, doing damage to extent of \$30,000. The building may be rebuilt shortly as the loss is fully covered with insurance.

Tenders are wanted to Jan. 8, for plumbing and heating, Poultry building, agricultural college, St. Vital; apply to provincial architect, 261 Fort St. Winnipeg.

Tenders are wanted to Jan. 9, by chairman, board of control, for construction of sewers; instructions may be obtained by city engineer, 223 James av., city.

Plans have been drawn up for B. G. Fonseca, proprietor of the Wolseley hotel for erection of a new 7-story block on corner Higgins and Austin; tenders will be called shortly.

Alterations and installation of an elevator are being made to Henry Birks & Sons building on corner Smith st. and Portage av. to extent of \$6,000.

The following building permits were issued: H. C. Stovel, 2-story dwelling on west side of Scotia, between Matheson and McAdam, to cost \$3,500.

The contract for the lifting of the storage tanks of the C. P. R. elevator at Transcona, has been let to the Foundation Co., of New York.

Tenders are wanted to Jan. 15, by chairman, board of control, for vacuum cleaning machine for King George isolation hospital.

A. W. Cooper, two and one half story dwelling, on south side of Inkster between Main and Aikens sts., to cost \$3,000.

Contract was awarded to Cooper & Watts, of Stonewall, Man., for public building to be erected there for \$19,195.

A. E. Allison, contractor of Winnipeg, is building camps for the Greater Winnipeg water project.

T. Stedman, alterations to store at 296 Portage av. to cost \$1,000.

DES MOINES, IOWA

Bert N. Mills, Representative, 310 Hubbell Building.

*Building activities of the Des Moines school board probably will be limited this year to the erection of an addition to Brooks school to cost about \$25,000. The question of issuing bonds will be submitted to the voters at the regular school election on March 9. Plans and specifications will be by Proudfoot & Rawson. A movement for a new West high school on Drake Park Square is thought to be a dead issue.

*The Des Moines Electric Co. announces that it will build a high tension power line to Oskaloosa this spring. This will furnish current for street lighting and for the operation of the street cars there. The cost will be about \$25,000. A similar line is to be built, also, to Carlisle.

*Fifteen blocks of paving, the first ever placed in Pella, are to be laid this year. Members of the city council were here this week to study various paving materials and they will decide on what material to use within a few days. The contract will call for about 34,000 square yards and the improvement is to cost about \$60,000. Parts of Main, Franklin, Washington and Broadway sts. are to be paved.

*A system of day labor and supervision is saving the school board thousands of dollars in the laying of cement sidewalks, according to board members. They claim they can put the sidewalks down for 3c a square foot less than the general contract price under this system.

*An electric light plant is to be built at Williams by Frank Gue of Keota who has bought the buildings of the Williamsburg Canning Co. as well as the lighting franchise voted to

that company by the city. Plans are to extend the system to Conroy and Parnell.

*Des Moines Odd Fellows announce plans for the addition of two stories and of elevator service for their three story building on W. Locust st. between 6th and 7th sts. The two additional floors are to be used for lodge purposes. Norman T. Vorse, architect.

*Petitions for the resurfacing of pavements in the business section of East Des Moines have been filed with the city council by East Side boosters. The same men are working, also, for the raising of the level of East Grand av.

*The Woodland Improvement League will work this year for the opening and paving of Ingersoll av. between 17th and 28th sts. and for the paving also of several streets between Ingersoll and Grand avs.

*The U. S. naval station at Pearl Harbor, Hawaiian Islands, soon will have a new water works system built by the Des Moines Bridge & Iron Co. which has secured the contract.

*Trustees of Za-Ga-Zig Temple of the Mystic Shrine will meet in February to determine finally regarding the project to build a \$100,000 temple here this year.

*The city council at Mt. Pleasant has called for plans for a new concrete reservoir and a pressure pump as an addition to the water works system.

*John A. Benson, members of the contracting firm of Benson & Marxer of this city, is new vice president of the Iowa Trust & Savings Bank.

*The hospital for tubercular patients, Polk county, is to be enlarged; James Uhl, supervisor.

SIoux CITY, IOWA

Sioux City Office: 310 Iowa Building; R. V. Sager, Representative.

BUILDING PERMITS.

B. Hessenius, frame dwl., Hornick's addition.....	2,500
M. Smith and G. R. Purse, planing mill, Leeds.....	1,000
W. J. Busch, frame dwl., Hedge's add.....	2,800
O. Hostead, frame dwl., Clark's add.....	3,500
W. E. Lukins, frame dwl., Leed's add.....	2,000
S. H. Montgomery, frame dwl., Leed's add.....	1,000
Alex Irwin, two frame dwls., East Sioux City add.....	2,000
R. J. DeGriant Drex, frame dwl., Davis add.....	1,800
Mrs. Ida Hedeon, frame dwl., Sioux City proper.....	2,000
Edwards & Bradford Lumber Co., frame barn, Central Sioux City.....	1,200
Sioux City Brewing Co., addition to building, Tax lot 14.....	4,000
August Peterson, rebuild frame dwl., Smith's villa add.....	1,000
J. G. Sandwall, house, Wright's addition.....	2,500

The new building for the Holiness Mission at 203 W. 7th st. is nearing completion. It is a 3-story building with basement; dimensions, 40x62, cement block construction; the basement will be used as a labor bureau, kitchen, dining room, etc. The first floor will be used as a large meeting room and the second and third floors will be used for living quarters.

Plans will be ready for bids Jan. 9, for the residence for M. E. Southwick at Merville, Iowa; Geo. W. Burkhead, architect, Grain Exchange building.

The Sioux City Brewing Co. will build an addition to the 3d story of their main building; it will be 36x36, and will cost about \$15,000.

A 2-story brick addition is being planned for the Weare property at 7th and Pearl sts. It will cost about \$7,000.

OMAHA, NEB.

Mail news to Minneapolis office not later than Wednesday.

BUILDING PERMITS.

Carl F. Nelson, 2703 N. 27th, frame dwl.....	2,500
C. E. Williams Co., agent frame dwl.....	2,400
Carl F. Nelson, 2706 N. 27th, frame dwl.....	2,500
Charles W. Martin, frame dwl., 2130 Pinkey.....	4,000
Helga P. Bergo, 4332 Miami, frame dwl.....	2,000
J. M. Norlen, 1934 S. 34th, frame dwl.....	3,500
Wm. Sedgwick, 3416 Dodge, frame dwl.....	3,000
Mrs. M. McCleave, 2703 Ft., frame dwl.....	1,800
Theo. Madsen, 1515 N. 31st, frame dwl.....	1,500
Phillip J. Kune, 3511 Burt, frame dwl.....	4,000

FARGO, NO. DAK.

Mail or telephone news not later than Wednesday.

The convention of the state association will be held in the Exchange rooms on Jan. 15, at 2 o'clock, p. m. The officers of the organization are: P. L. E. Godwin, Fargo, president; R. J. Piper, Minot, N. D., first vice president; J. D. Turner, Grand Forks, N. D., second vice president; Arthur Bowers, Fargo, third vice president and Victor H. Leeby, Fargo, secretary and treasurer; exchanges affiliated with the state association are Fargo, Grand Forks and Minot. It is expected that about 100 will be in attendance.

The North Dakota State association of Builders' & Traders' Exchanges will hold their fifth annual convention at Fargo on Jan. 15. In the evening of same date at 6:30 o'clock the state association members will be the guests of the Fargo Exchange at their 10th annual banquet to be given in the Commercial club rooms.

*Plans for juvenile ward for court cases are under consideration by directors of Florence Crittendon home, Lillian Topping, matron.

STREET AND ROAD WORK

Notes Arranged Alphabetically by States.

Alta., Edmonton—Estimates for the street work to be undertaken the coming year are as follows: grading \$33,909; boulevarding \$163,279; plank walks \$98,616; concrete walks \$129,314; address city clerk.

Ariz., Phoenix—Plans for expenditure of proceeds of \$1,500,000 road bond issue shortly to be submitted to people of Maricopa county, will be formed at meeting of road experts to be held here; State Engineer Lamar Cobb, to be asked to take part.

Ariz., Phoenix—Plans in preparation by city engineer for construction of bitulithic pavement on S. Central av., at a cost of \$45,000; 7th av., cost \$40,000; W. Washington st., cost \$78,000; address city clerk.

Ariz., Yuma—Board of supervisors of Yuma county will spend \$100,000 on a new road from here to the Maricopa county line; will cross Gila river at Antelope hill, where a state bridge will be erected.

B. C., New Westminster—Proposed to pave Columbia st. in front of the penitentiary, about 2,300 feet, of which the Dominion government will pay \$45,000. Municipal engineer has reported cost of macadamizing Ascot Drive at \$27,900.

B. C., Vancouver—Subject to revision by the council of 1914, the following work is provided for in the proposition submitted to the tax payers: Grading for sidewalks, ward 4, \$12,000; ward 5, \$7,000; ward 6, \$20,000; ward 7, \$7,500; ward 8, \$2,500; total, \$50,000. Grading streets, ward 4, \$15,000; ward 5, \$15,000; ward 6, \$25,000; ward 7, \$35,000; ward 8, \$20,000; total, \$110,000. Grading lanes, ward 3, \$5,000; ward 4, \$10,000; ward 5, \$6,000; ward 6, \$5,000; total, \$26,000. Culverts and bulkheads, ward 6, \$5,000; ward 7, \$5,000; total, \$10,000. Rocking streets, ward 4, \$14,000; ward 5, \$19,500; ward 6, \$25,000; ward 7, \$25,000; ward 8, \$12,500; total, \$96,000. Planking streets, ward 6, \$22,000; ward 7, \$25,000; total, \$47,000. Rocking lanes, ward 3, \$7,000; ward 4, \$15,000; ward 5, \$9,000; ward 6, \$10,000; total, \$41,000. Planking lanes, ward 4, \$5,000; ward 5, \$5,000; ward 6, \$10,000; ward 7, \$5,000; ward 8, \$5,000; total, \$30,000.

B. C., Vancouver—City council has decided to pave S. Cambria, Drake, Cordova and Vine sts., also Victoria drive, Commercial drive, and 71st av., at an estimated cost of \$311,776; F. L. Fellowes, city engineer.

B. C., Vancouver—F. L. Fellowes, city engineer, is preparing plans for various street improvements, estimated to cost \$175,000.

B. C., Vancouver—The Wall Street Improvement Association propose improvements on water front from Trinity to Renfrew sts., involving an outlay of about \$200,000.

Ida., Boise—Sidewalk and curb improvement district No. 1105 has been created, but bond issue will be required to make the desired improvement; Nancy E. Robertson, city clerk.

Idaho, Boise—The state highway commission has officially named the trunk lines of the state highway system, composed of 1,262 miles and traversing 27 counties, as follows: South Idaho east and west road, the Idaho Pacific; north Idaho east and west road, the Northern Pacific; highway to McCammon, Idaho-Utah; highway from Boise to Sawtooth range, Idaho Central; eastern north and south line, Idaho-Montana. The commission decided to consider construction of trunks of the system in the following order: first, New Meadow to Grangeville; 2d, Olds Ferry to eastern boundary of state; 3d, St. Regis pass to Spokane, north Idaho; 4th, Idaho Falls to Yellowstone park; 5th, Salmon City to Gibbonsville; 6th, Idaho-Montana highway, north from Idaho Falls. The \$200,000 of unsold bond issue was apportioned among the counties as follows: Shoshone, Kootenai, Latah, Nez Perce, Bannock counties, \$12,000 each; Lewis, Bear Lake, Bingham counties, \$5,000 each; Washington, Bonner, Godding and Twin Falls, \$10,000 each; Idaho and Ada counties, \$15,000 each; Elmore and Cassia counties, \$7,500 each; Lincoln and Power counties, \$8,000 each; Adams \$7,000; Boise \$1,000; Bonneville, \$3,500; Lempi \$6,000; Fremont \$14,500; Minidoka \$3,000; Frankln, \$4,000.

Ida., Caldwell—Petitions will probably be circulated among property owners on Kimball av., Arthur st. and Cleveland

blvd. for a comprehensive system of street paving, involving about 39 blocks; address city clerk.

Idaho, Lewiston—Board of county commissioners will be asked to take formal action in having county co-operative with state in securing construction of Nez Perce county link in north and south state highway.

Ida., Sandpoint—A petition calling for extensive street paving has been circulated by J. H. Cave, city engineer.

Iowa, Burlington—Board of supervisors adopted resolution for the construction of a typical half mile of concrete highway, to be of the best type and built under best supervision; F. W. Parrott, county auditor.

Iowa, Council Bluffs—E. F. Stimson, city engineer, will soon measure the frontage of property along South av. and Tostevin st. from the end of the paving on 16th st. to the junction of South av. with 29th av., in preparation for making an estimate on the probable cost of the city paving the two streets. The action in the matter is the result of the activities of the Lewis township board of trustees in circulating petitions among the farmers.

Iowa, Davenport—Plans proposed by alderman Wm. Mathes that city council adopt a definite policy in regard to paving and with limited means at hand give preference to the outlying districts, has met with decided approval of not only the majority of the members of the council but with the public as well; it is proposed to pave Middle road, Rockingham road, Hickory Grove road, Harrison st. road and High st. from the present terminus of their paving to city limits.

Iowa, Des Moines—Highland Park property owners have begun agitating for paving of Euclid av., from the end of the present pavement to Beaver av.; material not yet decided upon. A petition has been filed with Councilman Myer for pavement of Hickman av. from Beaver av. to the city limits; cement will be used; Horace Susong, city clerk.

Iowa, Muscatine—City Engineer Young proposes that in event Mulberry av. be improved with bitulithic, that the city purchase the brick which would be removed and use it to pave the levee between Iowa av. and Chestnut st.

Iowa, Sioux City—Nearly five miles of concrete paving will be laid in West Side streets this year if petitions filed with city council are granted; favorable action will be taken in at least a part of the cases.

Iowa, Traer—Council contemplates a large amount of street paving during the present year; address city clerk.

Kan., Winfield—Council declared it is necessary to curb and gutter both sides of Andrews st. from the south side of 7th av. to the north side of 8th av. in said city. W. C. Hail, city clerk.

Minn., Caledonia—Houston county will spend \$30,000 this year for improved roads; one state road will start at La Crescent and leading in a southwesterly direction, pass through Hokah, Houston and Caledonia and end at Spring Grove. The second highway, starting at Elitzen, at the extreme south-eastern end of the county will lead to Caledonia and Houston. It is proposed to buy a cement mixer and a stone crusher at a cost of about \$8,000. Robert Burns, county auditor.

Minn., Duluth—Commissioner Roderick Murchison has a plan for improving Superior st., between 15th and 25th avs. W., by paving it with brick, using the present macadam surfacing for a base.

Minn., Red Wing—The board of public works plans to call for bids for two paving propositions, one for the paving of three blocks on Bush st. from Levee st. to Main, and on Main st. from Broad to Plum st. and the second to include the entire paving district adopted by the council a few years ago; will call for bids for creosoted block paving on Main st. and sandstone and brick on Bush st., between Levee and Main sts., unless the council orders cement or other paving material, business men and property owners in general have expressed themselves as favoring creosoted block paving; address city clerk.

Minn., St. Paul—George W. Cooley, state engineer, has been interviewing government officials at Washington, D. C., recently for the purpose of getting assistance in the building of the proposed bridge over the Arrow river to connect the state highway now being built through Cook county with a similar highway under construction in the province of Ontario which has its eastern terminus at Port Arthur. His conclusions are that the bridge will have to be built through the joint action of the state of Minnesota and the province of Ontario. This road completed, will make a continuous road from Albert Lea, Minn., to Port Arthur, Ont., suitable for automobile traffic.

Mo., Festus—Plans are being prepared by Consulting Engineer Herman Phillips, C. H. Phillips, associate, Liggett building, St. Louis, Mo., for brick paving on concrete foundation; will require 2,327 cubic yards excavation, 7,135 square yards paving and 3,900 feet curbing and 6-inch gutters; cost \$22,000; P. S. Terry, mayor.

Mont., Butte—It is now expected that the portion of East Park st. between Covert and Gaylord sts., will be paved as soon as spring sets in. The total expense is estimated at

\$29,395; plans and specifications for the work are on file; address city clerk.

Mont., Missoula—Hearing Jan. 31, on the grading and paving of the alley running north and south through the south half block of block C, C. P. Higgins' addition to Missoula; W. H. Smith, city clerk.

Neb., Auburn—Thought to be an assured fact that court house avenue is to be paved in the spring; several other paving districts also under consideration; address city clerk.

Neb., Kearney—It is expected that portions of 1st av., 21st st. and Railroad av., and perhaps also Central av. will be paved this year; Wm. Knaggs, mayor.

Neb., Omaha—Part of the property owners of East Omaha want 11th st. repaved from Nicholas st. north to Avenue H, a distance of nearly a mile; cost approximately \$20,000.

Neb., Syracuse—The question of paving here is being agitated; address city clerk.

Neb., University Place—F. H. McClain is pushing the proposition to curb and gutter 19th st. from 33d to Touzlin av.; address city clerk.

Okla., Bartlesville—Officers of all the townships in Washington county recently held a meeting to decide upon plans for road construction estimated to cost \$250,000; address the county auditor.

Tex., Dallas—The city secretary has been authorized to purchase a carload of creosoted wood blocks for the repair of streets; address city clerk.

Texas, Mexia—H. T. Bennett, city engineer, writes that city paving bids will not be let for several months.

Texas, Montgomery—Citizens have voted to issue \$150,000 bonds for road improvements.

Tex., San Antonio—With \$5,000,000 available for street paving, it is estimated that only 112 miles can be paved if a first class paving is to be put down, the cost being about \$43,500 per mile for such paving; the popular idea is to pave the 600 miles of the city's streets with the best material available to do so much work; address city clerk.

Tex., Waco—Young Men's Business league recommend petitioning county commissioners for an election to vote \$500,000 to improve the highways in the Waco precinct.

Wash., North Yakima—The Yakima county commission is planning a system of continuous permanent highways from North Yakima to Moxee City, to Naches City, to Selah and for a distance into the Wenatchee valley, to Cowiche valley, to Wiley City, and down the Yakima valley to Mabton and Grandview, where it will connect with a road now under construction by the Benton county commissioners to and through Prosser. The commission has appropriated \$10,000 for a highway to the Kittitas county line, and the Kittitas county commissioners have promised \$2,500 a year to build the highway through to Ellensburg.

Wash., Tacoma—The county commissioners have adopted resolutions instructing county engineer to prepare plans, specifications and estimates for 13 miles of concrete paved roads to be built next spring and summer. These will be built under the permanent highway act and include an extension of 6.34 miles in the Mount Tacoma-Canyon road from the south end of permanent highway No. 3 at Spanaway; the construction of 5.28 miles of permanent highway between Puyallup and Orting; and the surfacing of 1.56 miles on the Sumner-Buckley highway from the city limits of Sumner to the county poor farm. The resolutions anticipate the use of no patent pavement, brick or other material than concrete; address city clerk.

Wis., Appleton—Meeting held here this week to take up plans for building a concrete highway between the two cities in the Fox river valley, Fond du Lac and Green Bay. The road will pass through Oshkosh, Neenah, Menasha, Appleton, Kaukauna, Wrightstown, Little Rapids and De Pere.

Wis., Beloit—Brick and concrete paving is contemplated here in the spring; Robert Caldwell, city engineer.

Wis., Fond du Lac—In view of the large amount of road work that is to be done in the county the coming season, Fond du Lac county is now debating the purchase of additional road machinery; Alfred S. Wilkinson, county clerk.

Wis., Green Bay—Efforts are being made to have an 18-foot, concrete road that will cost, about \$45,000 built on Fox river road through the town of Allouez, between Green Bay and De Pere during 1915.

Wis., Green Bay—Road machinery has been purchased by the county board of Brown county as follows, the total amount being \$7,848; Dubois-Haevers Co., Green Bay, 1 Monarch roller, \$2,250; 1 stone crusher, \$1,688. J. I. Case Co., Racine, 1 Case roller, \$2,068; 2 Case sprinklers, \$225; 2 road plows, \$40; 2 rooster plows, \$40. Russell Grader Co., Minneapolis, 2 graders, \$237.50. W. E. Burdeau, Suamico, 1 crusher and engine, \$1,300. Bids were also received from the following companies: The Kelly Springfield Co., Austin-Western Co., Galion Iron Works, Iroquois Co., Barber Asphalt Co., Huber Co., Good Roads Machine Co., Emerson-Brantingham Co., R. J. McGeehan, Son & Co., Ohio Road Machinery Co., Studebaker

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COPY RECEIVED up to Friday, 10 a. m.,
will be published in the paper, delivered to
subscribers on Saturday, but should reach
the publication office, Lumber Exchange,
Minneapolis, earlier in the week, when pos-
sible.

LATE NOTICES Friday morning can be
transmitted by long distance telephone.

MODEL SCHOOL.

State Normal School, Winona, Minn.
OFFICE OF C. H. JOHNSTON, ARCH-
ITECT, 715 CAPITAL BANK BLDG.,
ST. PAUL, MINNESOTA.

Sealed proposals will be received by
State Board of Control in their office in
the State Capitol Building, at St. Paul,
Minnesota, until 2 P. M., Jan. 15th
(Thursday) for the erection and com-
pletion of the Model School Building at
the State Normal School, Winona,
Minn., including the general contract
work, heating and ventilating, plumbing
and electrical work, in accordance with
plans and specifications furnished by
C. H. Johnston, Architect, 715 Capital
Bank Building, St. Paul, Minn. Bids
will be received collectively and sepa-
rately. Bids to be submitted only on
form of bid supplied by the Architect;
no other form will be considered. Bids
to be accompanied by a certified check
for 4 per cent of the amount of the bid,
payable to the Minnesota State Board
of Control, which check will be re-
turned when building contract is exe-
cuted.

Copies of above plans and specifica-
tions may be seen at Builders' Exchang-
es in St. Paul and Minneapolis, Minn.,
at the Pres. office of the above insti-
tution and at the office of the State
Board of Control, State Capitol Build-
ing, St. Paul, Minn.

Extra copies of the plans and speci-
fications may be obtained on applica-
tion to the architect on payment of cost
of duplication. Successful bidders
must furnish the Board with a surety
company bond in 75 per cent of the
amount of contract. The right is re-
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bids.

(Continued on Page 24.)

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Wis., Kenosha—Another effort is to be made to complete the Sheridan road from the state line to the north limits of the county and the officials of the city have notified E. L. Lobdell, president of the Sheridan Road Improvements association of the state of Illinois, that Kenosha, as a municipality, will be glad to meet him and make such plans as may seem wise to secure the completion of the road.

Wis., Milwaukee—According to Oscar E. Schwemer, chairman of the board of supervisors, Milwaukee county expects to spend \$720,000 this year for the improvement of its roads; at the rate of \$4,000 per mile, the average of the cost of the road improved last year, this will mean the improvement of 180 miles of highway.

Wis., Monroe—Plans are being prepared by Paul V. Hodges, city engineer, for paving about 15 blocks, from the public square south to S. Monroe st.; address city clerk.

Wis., Superior—Bids received by the town clerk, town of Superior, postoffice, station B, Superior, Wis., until noon, Jan. 17, for building abutments for a bridge at the crossing of the range line in town 47, ranges 14 and 15 and Nemadji river, near Borea; check for 5 per cent.

Wis., Superior—Resolutions prepared for paving of Ogden av. from N. 3d st. to Belknap st., and of Tower av. from 16th st. to the South Shore tracks south of 28th st.; it is hoped to be ready to start as early in the spring as the weather will permit; resolutions provide for concrete base, but the surface material will be determined by property owners on each av.; asphalt seems to be favored; address city clerk.

Wis., Watertown—Twelve blocks of paving in College av. and N. 2d, probably cement, is contemplated here in the spring; Frank S. Weber, city clerk.

BIDS WANTED.

Iowa, Monticello—Bids received by C. J. Northrop, city clerk, until 8 p. m., Feb. 4, for 7,300 square yards paving, 4,500 lineal feet combined curb and gutter, two catch basins, 100 lineal feet of special combined curb and gutter and 40 lineal feet of 15-inch storm sewer; check for \$500. Officially advertised in this issue of the Improvement Bulletin.

Iowa, Waukon—(Re-advertisement)—Bids received by J. D. Cowan, city clerk, until Feb. 10, for 21,100 square yards of vitrified brick pavement on concrete foundation; Aetna Engineering Bureau, engineers, 17 N. La Salle st., Chicago, Ill.

Kan., Concordia—Bids received by L. W. Lash, city clerk, until 8 p. m., Jan. 26, for curbing, paving and guttering certain streets; Worley & Black, engineers; E. A. D. Parker, city engineer.

Minn., Mankato—Bids received by C. L. Kennedy, county auditor, Blue Earth county, until 2 p. m., Jan. 15, for approximately 57,200 square feet willow mat, 4,000 cubic yards earth fill and eight 12-inch 28-foot corrugated metal culverts. Check for 10 per cent.

Mont., Billings—Bids received by L. E. Torrence, city clerk, until Jan. 20, for 18,500 yards of paving in district 105; C. E. Durland, city engineer; check for \$7,000.

Mont., Missoula—Bids received by W. H. Smith, city clerk, until 10 a. m., Jan. 24, for paving improvement district No. 29, Main st., with either vitrified brick, creosoted wood block, bitulithic or asphaltic concrete, total area to be approximately 8,600 square yards; check for 10 per cent. Fred E. Buck, city engineer.

S. D., Sioux Falls—Bids received by Walter C. Leye, city auditor, until 9 a. m., Feb. 16, for a pavement on Phillips av. from south line of 13th st. to the south line of 18th st.; check for \$1,000; also at same time, for a pavement on Phillips av. from south line of 7th st. to south line of 13th st.; check for \$2,000; officially advertised in this issue of the Improvement Bulletin.

CONTRACTS AWARDED.

Ill., Elgin—Contract to Logan & Giertz Construction Co. for asphaltic concrete paving in district No. 1, 42,852 square yards, at \$62,000; M. H. Brightman, city engineer.

La., Lake Charles—Contract awarded Richard M. Hyams, New Orleans, for wood paving in Broad st., at \$36,000.

Man., Winnipeg—Contract for 7 additional miles of paving on Portland av. awarded the Bitulithic Paving Co. at \$246,258.

Mich., St. Josephs—Contract to Jacob Ackerman & Co., La Porte, Ind., for the construction of 3 miles of Three Oaks-Galien road, at \$17,200, and for 5.6 miles of the New Buffalo-Three Oaks road at \$28,675.

Minn., Dodge City—Contract with the International Harvester Co. for a gas traction engine at \$2,355. Other bidders were: Kinnard & Haines Co., at \$2,400; Avery Co., \$2,292; Minneapolis Steel & Machinery Co., \$2,800; Pioneer Tractor Manufacturing Co., \$2,750; Rumley Products Co., \$2,547. Contract was made with J. D. Adams & Co. for two road graders at \$1,480. Other bidders were the Austin-Western Co. at \$1,300, and the Russell Grader Manufacturing Co. at \$550.

Minn., Warba—Contract for the Blackberry-Warba road has been let to J. M. Dowling of Duluth at \$5,000 for the three miles.

Mo., Independence—Contract to Ross & Co., corner Armour and Locust sts., Kansas City, Mo., for macadamizing road from Oak Grove to Sni Mills, 4.2 miles, at \$30,278.

Wis., Green Bay—Contract to W. R. Ullmer to furnish 125 cords of stone for a road to be built on the Shawano highway at \$4 per cord; the contract was let by George Cormier, highway commissioner.

BRIDGES

Notes Arranged Alphabetically by States.

Iowa, Burlington—County board passed resolution to construct all necessary bridges in county as early as possible. J. H. Pettibone, chairman, F. W. Parrott, county auditor.

Iowa, Des Moines—Bids received by H. B. Frase till 10 a. m. Jan. 12, for construction of one concrete bridge abutment, with wing, walls and other repair work to steel tubes and structural steel; check for 5 per cent.

Iowa, Storm Lake—Ira Davidson has been engaged to superintend the building of all the larger bridges in 1914. Geo. K. McCullough, county engineer will supervise the work.

Mich., Grand Haven—Engineers Rumsey and Works, Houseman building, Grand Rapids, Mich., have prepared plans for a wooden bridge at Spring Lake here.

Minn., Deer River—Hennepin Bridge Co. have begun work on the Brooks bridge.

Minn., Duluth—The county auditor, O. Halden is advertising for bids for a steel bridge over Stony Brook on the Duff road, bids to be opened in January some time.

***Minn., Hastings**—Bids received till 10 a. m., Feb. 3, for state bridge 740; by county auditor; see official advertisement in the Improvement Bulletin this issue.

Minn., Hibbing—Minnesota Northwestern Electric Railway Co. let contract to Mr. Halseth, Donaldson, for a bridge over Thief River at a point about 300 feet northwest of the bridge known as Long's bridge.

Minn., Marshall—A steel and concrete bridge will be constructed across Yellow Medicine river between secs. 8 and 9, estimated cost \$5,000; J. B. Gislason, clerk, town board of Westerheim.

Minn., Minneapolis—Elimination of all remaining railway crossings in the city and the expenditure of \$1,000,000, will be ordered by a series of ordinances to be introduced in council at February meeting; F. W. Cappelen, city engineer.

Minn., Minneapolis—City Engineer Cappelen is making preliminary plans and estimates of cost for a concrete bridge at 19th av. S. and will submit it to council Jan. 9. The steel type adopted some time ago by council will cost \$285,000.

Minn., St. Cloud—An interurban line from Minneapolis to Duluth with this city the center will be built by the Minnesota Union Electric Railway Co., this road will require a number of bridges and culverts.

Mont., Conrad—The wooden bridge across a dry coulee between Naismith and the Marais river, on the G. N. line, burned.

Mont., Great Falls—A large bridge over the Great Northern line 6 miles south of Shelby damaged by fire to the extent of \$3,000.

Neb., Osceola—Bids received to 4 p. m., Jan. 27, for construction of all concrete bridges in Polk county for 1914; check for \$100. R. E. Dearborn, county highway commissioner.

Tex., Houston—Bids will be taken about Feb. 1, for bids for a reinforced concrete bridge over Buffalo Bayou at Franklin av. The bidder will be invited to submit a bid based on his own design which must be in accordance with plans on file at office of city engineer E. E. Sands; plans completed for same Jan. 15; estimated cost \$140,000; Ben Campbell, mayor.

Wis., Beloit—City Engineer Robt. Caldwell began a survey for the Public av. bridge.

Wis., Beloit—City contemplates building a steel and concrete bridge across Rock river; may mature next summer; engineer not selected yet; Robt. Caldwell, city engineer.

Wis., Green Bay—This city will have to build and pay entire cost of bridge across the Fox at Mason st. Highway commission decreed that bridge was a necessity but not enough of a necessity to warrant the state and county giving aid. The finance committee will sell the bond issue of \$170,000 at once.

CONTRACTS AWARDED.

Minn., Winnebago City—G. A. Williams this city has contract to build two bridges northeast of Delevan.

Wis., Bayfield—Eben Olson, Port Wig has contract for approaches on Long Bridge road at end of steel bridge.

CONTRACTORS BONDS AND EMPLOYERS LIABILITY INSURANCE

EQUITABLE SURETY COMPANY
Assets \$1,484,744.80

Surety Bonds Executed Here
Casualty Insurance
Phone 622

"NO RED TAPE OR DELAY" THE OCEAN ACCIDENT & GUARANTEE
CORP. Assets 4,776,085.18

Hood & Penney Company, General Agents

PHOENIX BUILDING,
Minneapolis
Minn.

PROPOSAL ADVERTISING FOR BIDS.

STRUCTURAL WORK FOR NORTH WING AND THE NORTHEAST AND NORTHWEST CORNER PAVILIONS OF THE WISCONSIN STATE CAPITOL.

The Capitol Commission of Wisconsin invites proposals for furnishing the necessary labor and material for the structural work for the North Wing and the Northeast and Northwest corner Pavilions of the Wisconsin State Capitol now building at Madison, Wisconsin.

This work is to be executed in accordance with the plans and specifications prepared by George B. Post & Sons, Architects, and is to be done under their supervision and direction.

Plans and specifications for the work may be examined at the following places, viz:

The office of the Architects, 101 Park Avenue, New York.

The office of the Capitol Commission, new South Wing of the Capitol, Madison, Wisconsin.

The Builders' & Traders' Exchange, Milwaukee, Wisconsin.

The American Contractor, 180 N. Dearborn St., Chicago, Ill.

The Improvement Bulletin, Lumber Exchange building, Minneapolis.

Plans may also be obtained for the individual use of prospective bidders by depositing with the undersigned a certified check of \$100.00, which check will be returned to the maker upon the return of the plans.

All proposals must be made on printed blanks and must be accompanied by a certified check (in amount of 5 per cent of the total proposal) which will, in case the proposition of the maker is accepted and he fails within ten days to execute a satisfactory contract and furnish a bond as provided by law, be forfeited.

Proposal blanks may be secured by application to the undersigned, to whom all proposals must be delivered, sealed

and properly endorsed, by Tuesday noon, Jan. 27, 1914.

Lewis F. Porter, secretary.

Capitol Commission of Wisconsin.
Madison, Wisconsin.

PROPOSALS OF GENERAL, HEATING, PLUMBING, ELECTRIC AND ELEVATOR WORK FOR HOSPITAL BUILDING.

Yankton, S. D.

Sealed proposals will be received at the Sacred Heart Hospital, Yankton, S. D., by the Mount Marty Hospital Association, of Yankton, S. D., up to 11 A. M., Feb. 16, 1914, for the erection of a brick and reinforced concrete hospital building in accordance with plans and specifications furnished by Hartford & Jacobson, 601-2 Capital Bank Building, St. Paul, Minn. Bids shall be submitted upon form of proposals supplied by architects. Bids shall be accompanied by a certified check of 2 per cent of amount of proposal on general work, and 5 per cent upon heating, plumbing, electric and elevator work, made payable to Venerable Sister Juliana, Treasurer of the Association, as guarantee that bidder will furnish approved bond and enter into contract, if contract is awarded to him. Certified checks to be returned to unsuccessful bidders when award is made and to successful bidders after contract is entered into and bond is filed and accepted.

Plans will be on file at the office of architects, at office of D. B. Gurney, Yankton, S. D., and at the Builders' Exchange, St. Paul. Plans will be issued by architects on and after January 16, 1914.

Extra copies of the plans and specifications may be obtained from the architects on the payment of cost of duplication and upon depositing a certified check for Fifteen Dollars, made payable to architects. Upon return of plans and specifications to architects and payment for plans and specifications, certified check shall be returned.

Successful bidders shall furnish Board with a surety bond of 100 per cent of

the amount of contract. The right is reserved to reject any and all bids.

HARTFORD & JACOBSON,
Architects for the Mt. Marty Hospital Association, Yankton, S. D.

NOTICE TO PAVING CONTRACTORS.

Sioux Falls, So. Dak.

Sealed bids will be received by the Board of Commissioners of the City of Sioux Falls, S. D., at the office of the City Auditor, up to 9 o'clock a. m., of Monday, the 16th day of February, 1914, for the construction of pavement on Phillips Avenue from the south line of Thirteenth Street to the south line of Eighteenth Street.

Bids will be received on each of the following kinds of pavements; Creosoted Wood Block, Sheet Asphalt, Asphaltic Concrete, Bitulithic, Portland Cement Concrete, Dolarway and Tarvia Macadam, to be constructed in accordance with plans and specifications on file in the office of S. B. Howe, City Engineer of said City.

Each bid must be accompanied by a duly certified check for the sum of \$1,000.00 drawn on some known solvent bank of the City of Sioux Falls and made payable unconditionally to the City Treasurer of the City of Sioux Falls, S. D., as a guarantee that the bidder will, his bid being accepted, enter into a contract with and furnish the required bond, to said City.

The work will consist of approximately 9,500 square yards of pavement.

Specifications and blank form of proposal may be obtained from S. B. Howe, City Engineer.

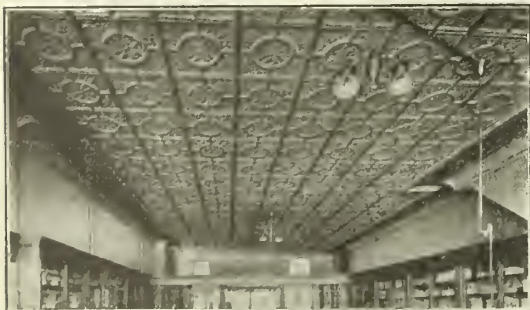
Each bid must be endorsed on the outside with a statement showing the work covered by the bid and must be filed with the City Auditor before the hour above mentioned.

The right is reserved to reject any or all bids.

Sioux Falls, S. D., this 6th day of January, 1914.

WALTER C. LEYSE,
City Auditor.

(Continued on page 26.)



SEND US YOUR PLANS
Our figures cost nothing, and
YOU WILL SAVE MONEY

Don't Make a Mistake!

You Can Buy the Best Sheet Metal Work

such as Cornices, Steel Ceilings, Skylights,
Ventilators, Gutters, Ridgings, etc., etc.,

[Right Here at Home—No Wait, No Worry

**ST. PAUL ROOFING, CORNICE
and Ornament Co.**
ST. PAUL, MINN.

SEWERS

Notes Arranged Alphabetically by States.

Alta., Edmonton—The engineering department estimates the following sewer work for 1914; lateral sewers, \$463,450; lateral sewers south side, \$200,000; trunk sewers, \$900,000; sewage disposal plant, \$116,000; storm sewers, \$20,000; petitioned sewers, \$10,000.

Ark., Rector—It is stated that bids will be received in the spring for a sewer system here; Frank L. Wilcox, engineer, Chemical building, St. Louis, Mo.

Iowa, Des Moines—A \$2,000,000 sewer system is needed, according to Councilman Myerly, to replace the inadequate system now in service; has not been able, thus far, to finance it. The sewer system for the northwestern part of the city he expects to accomplish this year; it is his belief that the city must plan a sewer system up the Raccoon river valley, to drain the western part of the city and Valley Junction; Horace Susong, city clerk.

Iowa, Eldora—Plans for steel viaduct over the Iowa river approved by the state highway commission, 960 feet long; cost \$38,000.

Iowa, Sioux City—City Engineer J. M. Lewis has prepared plans and estimates for the W. Perry st. conduit.

Kan., Topeka—Resolution adopted by city commission for preliminary survey for a sewer system in the east part of the city; address city clerk.

Minn., Duluth—The inspector appointed to consider the matter recommend that the sewer for the Finnish college be laid down Swenson av. to the right-of-way of the N. P. Ry., then one block west of Clyde av., and from there to the Louis river. Damages to the Swenson property were allowed in the sum of \$500, and to the West Duluth Dock Co. in the sum of \$300.

Mo., Silver Springs—Plans for a sewer system here prepared by Harry Stevens, Union Trust building, Washington, D. C., have been approved.

Mo., Springfield—Plans are about completed by C. E. Phillips, city engineer, for over three miles of sewer mains in the 5th ward, to cost approximately \$24,000; it is expected that J. H. Langston, city clerk, will soon be prepared to receive bids.

Neb., Ravenna—Election to be held shortly to vote on issuing bonds in the sum of \$21,500 for a sewer system here; C. B. Cass, city clerk.

Neb., St. Paul—An ordinance is being published to create sewer districts for the purpose of establishing a sewer system; A. C. Howell, county clerk.

S. D., Yankton—Bids received by John W. Summers, city auditor, until 7:30 p. m., Jan. 19, for a lateral sewer along the alley which runs north and south through block No. 16, in Witherspoon's Yankton; check for \$100.

Tenn., Cleveland—Solomon & Norcross, Atlanta, Ga., engaged as engineers to prepare plans for sewerage; C. F. Carter, city clerk.

Wyo., Fort Yellowstone—Bids for outfall sewer rejected; will be re-advertised next spring; address city clerk.

BIDS WANTED.

Iowa, Alden—Bids received by H. E. Button, city clerk, until Feb. 2, for 11,635 feet of sewers, 27 manholes, 2 flush tanks, 3 lamp holes, 250 feet sewer outlet and a septic tank; work to begin March 1.

Iowa, Clinton—Bids by city clerk, until about Feb. 10, for sewers in district No. 3.

Iowa, Grinnell—Bids received by A. O. Harriman, city clerk, until Jan. 30, for 5 miles of main sewers, 7½ miles laterals, 150 man-holes and flush tanks; ½ mile of deep work, or may be tunnel construction; cost about \$75,000; T. L. Blank, sanitary engineer.

Iowa, Montezuma—Bids received by R. A. Mortland, town clerk, until 1:30 p. m., Jan. 22, for a sanitary sewer of vitrified clay tile from 6 to 12 inches in diameter; check for \$500.

Minn., St. Paul—Bids received by Oscar Claussen, commissioner of public works, until 5 p. m., Jan. 15, for a storm sewer on Cherry st., from Maria av., etc.; check for 10 per cent.

Minn., St. Paul—Bids rejected for the Woodlawn-Fairmount sewer system and new bids will be taken until Jan. 15. The estimate was \$72,500, and the lowest bid was \$86,000.

Mo., Chillicothe—Bids for construction of main sewer and laterals in southwest part of the city will be called for in January; address city clerk.

Mont., Butte—(Readvertisement)—Bids received by W. A. Willis, city clerk, until March 1, for a sanitary sewer in Mercury and Diamond sts.; certified check for \$1,000.

Neb., Bancroft—Bids received by village clerk until 8 p. m., Jan. 19, for a \$20,000 sewer; Towle Engineering Co., City National Bank building, Omaha, Neb.

Okla., Atoka—Bids received by P. P. Williamson, city clerk,

until 8 p. m., Jan. 19, for a system of sanitary sewers, estimated to cost \$30,000; B. C. McCleary, city engineer and J. E. Davis, Caddo, Okla., consulting engineer.

Wis., Wales—Bids will be received in the spring by M. J. Tappings, secretary state board of control, Madison, Wis., for the sewage disposal plant at the Wales sanatorium.

CONTRACTS AWARDED.

Kan., Concordia—Contract has been let to McGuire & Stanton, Leavenworth, Kan., for sanitary sewers; E. E. Harper, sanitary engineer.

Minn., Hastings—Contract to John Lind for the 2d st. trunk sewer system at \$28,000.

Mo., Trenton—Contract to Hoover Bros. for sewers in district No. 9, at \$18,127 and to P. A. Johnson, Kansas City, Mo., in district No. 16 at \$10,155.

DRAINAGE AND IRRIGATION

Notes Arranged Alphabetically by States.

Iowa, Fort Dodge—G. P. Smith has been appointed engineer to survey for proposed drainage district 189.

***Minn., Bemidji**—Bids received by J. L. George, auditor Beltrami county, until 2 p. m., Jan. 27, for judicial ditch No. 18, total estimated cost being about \$11,741. Officially advertised in this issue of the Improvement Bulletin.

Minn., Fairmont—Hearing Feb. 2, 10 a. m., on judicial ditch No. 40; E. R. Flygare, clerk district court, Martin county.

Minn., Le Sueur Center—County board will have hearing Jan. 23, on large drainage ditch for 600 acres, near Reeder's crossing.

Minn., Warren—Bids received until 11 a. m., Jan. 16, for steel and wooden bridges over main ditch, judicial ditch 11, Marshall and Beltrami counties. A. G. Lundgren, county auditor; W. R. Hoag, engineer, Thief River Falls, Minn. State standard specification for Minnesota; blanks furnished by county auditor.

Mont., Billings—Big Horn Canon Irrigation & Power Co. has surveyed for railroad from mouth of Canon 2½ miles eastward of Custer, to complete project; to be electric, 58 miles long.

Neb., Hebron—County Surveyor A. D. Thompson has been engaged to survey and estimate cost of drainage for sections 29, 23, 31, and 30, petitioned for by J. M. Marsh.

Neb., Oshkosh—Work on the big ditch the Northern River Power Co. and irrigation canal is about to make to be commenced and the ditch constructed.

Wis., New London—Improvement of river front has started with arrangements for establishing dock lines on Wolf river, as suggested by L. M. Mann, United States engineer.

WATER WORKS

Notes Arranged Alphabetically by States.

Alta., Athabasca—A vote will be taken Jan. 12, on issuing bonds for \$85,000 for completing water works system; write president board of trade, Athabasca Langing.

Alta., Edmonton—Engineering department has prepared estimate for water mains to be built next year at \$600,000, a new pumping station is also suggested. Mr. Turner, superintendent of water works.

Iowa, Humeston—Bonds for \$21,000 were voted for construction of a municipal water works system.

Iowa, Milford—Election Jan. 5 to vote on issuing bonds for a water works system. P. Hagerty, mayor.

Iowa, Moulton—Engineer E. E. Harper, Grand Avenue Temple, Kansas City, Mo., is preparing preliminary plans for water works here.

Iowa, Mount Ayr—Contract for water works awarded to Des Moines Bridge & Iron Co.

Iowa, Mount Pleasant—Contract for reservoir and pressure pump has been let by council.

Iowa, Pittsfield—Bonds for water works were defeated at special election.

Iowa, Sheffield—Preliminary plans are being made for a water works system here by E. E. Harper, engineer, Kansas City, Mo.

Kans., Douglass—Plans for water works and filtration plant have been approved and contract will be let Jan. 20. Albert C. Moore, consulting engineer, Batlett building, Joplin, Mo.

Man., The Pas—Bids received by H. H. Elliot, 6 p. m., Feb. 3, for 430 feet of 16-inch supply intake pipe; Murphy & Underwood, engineers, Saskatoon, Sask.

Minn., Hibbing—Council has ordered five wells sunk at Alice; H. D. Haley, recorder. 256 Plymouth av. N. have contract to drill artesian well for

**Employers' Liability Insurance
Surety and Fidelity Bonds.**

FRED L. GRAY COMPANY

THE LARGEST AGENCY OF ITS KIND
IN THE NORTHWEST

More than 50,000 personal
injury cases handled for
contractors and others
since 1892.

Security Bank Bldg.,

MINNEAPOLIS

PROPOSAL ADVERTISING FOR BIDS

BOILER, PERHAM, MINN.

Sealed bids will be received by the Village Council of Perham, Minn., for one 72x18 boiler. Bids to be opened by the Council, January 12th at 8 P. M., 1914.

Right is reserved to reject any or all bids or to accept the one conforming to specifications which are on file with the Village Recorder.

PAUL MILLER,
Recorder.

BUSINESS OPPORTUNITY.

I own two lots across the street from the source of Rock Springs Water. This water, the king of table waters,

bottled by the Jacob Ries Bottling Works, has won prizes at many expositions. I can sell water from the same vein and, wanting a partner with means, am willing to give him the use of my name and water in exchange for financial backing. Here is one of the best opportunities in Minnesota for a business investment. Address, J. G. Ries, Shakopee, Minn.

NOTICE TO PAVING CONTRACTORS.

Sioux Falls, So. Dak.

Sealed bids will be received by the Board of Commissioners of the City of Sioux Falls, S. D., at the office of the City Auditor, up to 9 o'clock a. m., of

Monday, the 16th day of February, 1914, for the construction of pavement on Phillips Avenue from the south line of Seventh Street to the south line of Thirteenth Street.

Bids will be received on each of the following kinds of pavements; Granite Block, Creosoted Wood Block, Asphaltic Concrete, Bitulithic, Portland Cement Concrete and Dolarway, to be constructed in accordance in the plans and specifications on file in the office of S. B. Howe, City Engineer of said City.

Each bids must be accompanied by a duly certified check for the sum of \$2,000.00 drawn on some known solvent bank of the City of Sioux Falls and made payable unconditionally to the City Treasurer of the City of Sioux Falls, S. D., as a guarantee that the bidder will, his bid being accepted, enter into a contract with and furnish the required bond, to said City.

The work will consist of approximately the following quantities; 14,000 square yards of pavement outside of street car tracks; 2,300 square yards of pavement along street car tracks.

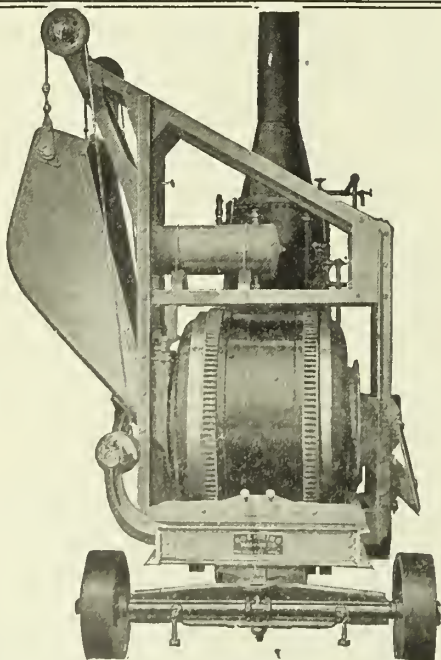
Specifications and blank form of proposal may be obtained from S. B. Howe, City Engineer.

Each bid must be endorsed on the outside with a statement showing the work covered by the bid and must be filed with the City Auditor before the hour above mentioned.

The right is reserved to reject any or all bids.

Sioux Falls, S. D., this 6th day of January, 1914.

WALTER C. LEYSE,
City Auditor.



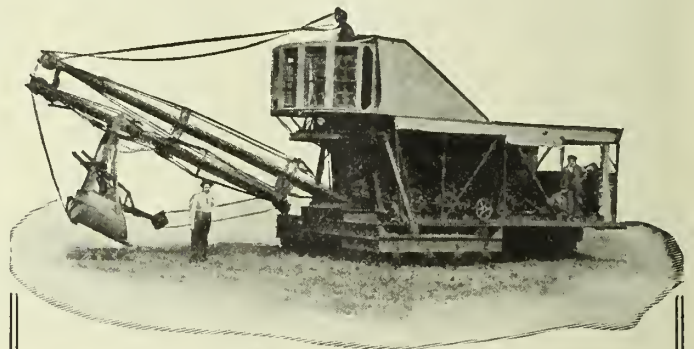
Why don't YOU use a Koehring "3 in 1" Mixer?

As long as there is a mixer with a "3 in 1" mixing movement—with a sturdy, smooth-running drum—with all parts of finest materials and made by expert workmen—with a capacity for much hard work—with a long life—why don't you used that mixer?

Write for the Koehring book TODAY.

Koehring Machinery Company

Milwaukee Wisconsin
N. W. Branch Office, H. B. Jones, Dist. Mgr.,
350-352 Security Bank Bldg. Minneapolis



Gopher Traction Ditcher

THE MOST PRACTICAL MACHINE FOR DIGGING
IRRIGATION OR DRAINAGE DITCHES

Travels under own power on three large caterpillars having 100 square feet of bearing surface on the soil.

Weight per square foot on the ground is 23 per cent less than the weight under the average man's foot.

Will sustain its weight in the softest marshes, turn a right angle, go forward or back, climb a 25 per cent grade, load on car with own power, and is not too wide to cross country highway bridges.

EQUIPMENT

4-Cylinder Engine	24 Foot Boom
Caterpillar Tractors	1 Yard Dipper
Stump Puller	
-;- Electric Light with Auxiliary Engine	-;-

Two Machines Ready For Immediate Delivery
If this is interesting write to us for further particulars

DIX MACHINE CO., Stillwater, Minn.

***Minn., Wabasha**—Official advertisement appears in the Improvement Bulletin this issue for bids for water works system; J. F. Druar, consulting engineer, Oscar Claussen Engineering Co., St. Paul.

Minn., Minneapolis—The S. Swenson Artesian Well Co., American Linen Supply Co., Mary Place, 1,000 feet deep.

Minn., Sanborn—Bonds for \$10,000 were voted for water works.

Mont., Columbus—Bids received by Geo. A. Westover, town clerk, 8 p. m., Feb. 2, for furnishing all material and labor for construction of municipal water works system; check for \$2,500.

Mont., Columbus—Time has been extended to Feb. 2, for receiving bids for construction of water works system. Geo. A. Westover, town clerk.

Neb., Auburn—Work will begin at once on extension of building at city pumping plant.

Neb., Ord—Dean Stout of the engineering department of the state university arrived here with a view to the establishment of a water power project on the North Loup river.

Ore., Umatilla—Plans have been completed for a water system here by consulting engineer L. C. Kelsey, Portland; cost \$20,000.

Wis., Green Bay—Special election soon to vote on buying the water plant. T. J. Oliver interested.

ELECTRICAL

Notes Arranged Alphabetically by States.

Alta., Calgary—Eau Claire Lumber Co. is considering the erection of a power house and electric plant on banks of the Bow river, either a gas engine or steam will be installed.

Iowa, Dennison—Election Jan. 22, to vote bonds for taking over the present electric light plant by the city, and extending and improving same.

Iowa, Grimes—Election Jan. 22, to vote on issuing bonds for \$4,000 for electric light plant or transmission lines and electric light purposes. A. F. Larson, town clerk.

Iowa, Merrill—A vote will be taken Jan. 19, on enlarging the electric light plant.

Iowa, Royal—A building will be erected by the Royal Telephone Co.

Iowa, Sioux City—The Sioux City Service Co. will enlarge its plant, improve tracks and install better equipment, estimated cost \$200,000. E. L. Kirk, general manager.

Minn., Adrian—Business men headed by M. E. Mehrten are raising funds for an ornamental street lighting system.

Minn., Crookston—The new dam has been completed and the generators are installed in a temporary building; in the spring a brick power house will be built.

Minn., De Graff—An electric light system will be installed. C. D. Neenan, village recorder.

Minn., Fergus Falls—Otter Tail Power Co. has made a proposition to this city to buy the light plant, meters, etc., and furnish meters free to all new subscribers, and furnish capital for all new additions and extensions to city plant, contract to continue until July 1, 1927, when the existing Hoot Lake contract expires; if Hoot Lake contract is extended, city will have option of continuing the proposed contract. Vernon A. Wright, president of Otter Tail Power Co.

Minn., Glyndon—Glyndon Light & Power Co., incorporated by A. J. Fitzsimmons, L. M. Lowe and others. Capital, \$5,400.

Minn., Grey Eagle—Mr. Ward of Sauk Center has sold his telephone line between here and Sauk Center to G. Hausser.

Minn., International Falls—The Minnesota & Ontario Power Co. will install additional generating and auxiliary equipment.

Minn., Hibbing—The village of Kitzville has granted a franchise to the Chisholm Electric Light Co., to erect poles and wire in the village for the sale of current. John Meadows, president of Kitzville council.

Minn., La Porte—The La Porte Telephone Co. and the Guthrie Telephone Co. have arranged for connections between the lines.

Minn., Minneapolis—Adolph Meyer, consulting engineer, St. Paul, has filed his report on the proposed municipal electric light plant at the high dam to supply electric current for light and power for the city of St. Paul and the university. Hydro-electric machinery of 15,200 horsepower or 10,500 kilowatt capacity would be best for such a plant, Mr. Meyer says, and that the steam flow and fall at the dam warrants such machinery, cost \$700,000.

Minn., Montevideo—The Montevideo Electric Light & Power Co. will install a new engine in the power house and next spring a building will be erected.

Minn., Monticello—First pole line system of the Monticello Electric Light & Power Co. has been completed, other lines will be built as required, work has started on the power house, completed next spring.

Minn., Parkers Prairie—L. J. Morrison has started work on the electric light plant.

Minn., Thief River Falls—Main street will have cluster lights.

Minn., Winona—Agitation started for a white way lighting system on business streets. Geo. Hirsch, interested.

Minn., Montevideo—Citizens Telephone Co. was granted a franchise. A. M. Parks, city clerk.

Mont., Carlyle—J. A. Cox, representing eastern capital, addressed a farmers' meeting about proposed electric road from Beach, N. D., to Baker, Mont. Farmers may decide to build the line themselves and a committee was appointed to look up the proposition. Jas. Anderson, Carlyle, chairman.

Mont., Huntley—Farmers' Telephone Co. has completed setting poles for extension of their line to Worden, connections will be made with the Ballantine line.

Mont., Musselshell—Carpenter Creek Railroad Co. has made application for charter to build an electric or steam railroad between Musselshell and Japan; C. M. Jacobs, director.

Neb., Gordon—The Telephone is installing a new drop switchboard in local exchange.

Neb., Omaha—Work will soon begin on a telephone exchange building at 30th and Foyler av.; cost \$100,000. Nebraska Telephone Co. also contemplates another building in the southwest part of city.

Neb., Winside—Bell Telephone Co. considering erecting a new telephone exchange.

N. D., Grand Forks—Efforts are being made to have the white way lighting system extended on Bruce av., 4th and 5th sts.; Chas. J. Evanson, city auditor.

N. D., Hazelton—An electric plant has been ordered from Fairbanks, Morse & Co., and electric lights will soon be installed here; G. A. Lenhart, A. E. Klabunde, committee.

N. D., Spiritwood—The Winfield Township Farmers' club has purchased a telephone line and has incorporated the Winfield Rural Telephone Co.; improvements will be made.

S. D., Deadwood—The Homestake Mining Co., T. J. Grier, superintendent, will build this year a steam electric generating plant of 3,200 h. p., cost \$45,000, and a boiler plant, estimated cost \$100,000 and a new hoist; total cost of improvements \$350,000.

Wis., Fennimore—Manager Geo. P. Angus of Lancaster has started work on the electric line from here to Lancaster through Gregory and Holland, new mazda street lamps will be put in; farmers within a radius of five miles will be supplied with electricity if they will build their own line.

Wis., Lena—Lena Electric Light & Power Co. organized and work will begin at once on pole line, completed Feb. 1.

Wis., Madison—An addition will be built to the local exchange of the Wisconsin Telephone Co.

Wis., Manitowoc—This city has finally completed purchase of electric light plant for \$145,000. Mayor Stolz states that the next move will be to take over the gas plant and the telephone plant.

Wis., Milwaukee—Wisconsin Telephone Co. approved the appropriation of \$300,000 for improvements on the Milwaukee, Madison, Eau Claire and Beloit exchange.

Wis., Sheboygan—The formal transfer for the Sheboygan Railway & Electric Co. to local interests headed by Peter and John Reiss was made Jan. 3.

Wis., Superior—A vote will be taken at spring election on taking over the street railway by the city.

BIDS WANTED.

Iowa, Farnhamville—Bids received 6 p. m., Jan. 19, by J. W. Hartinger, clerk, for furnishing material and constructing electric light and power system.

Minn., Virginia—Bids received by J. W. Murphy, secretary, 8 p. m., Jan. 19, for the partial covering of 1101 feet of a steam line running from the power plant of this city to the power plant of the Virginia & Rainy Lake Co. with galvanized iron covering to be of No. 24 gauge galvanized iron, together with all other work necessary and incident thereto. Check for 20 per cent. Bids will also be received for 100 peeled cedar poles, 35 feet long; check for 20 per cent.

PARKS AND CEMETERIES

Notes Arranged Alphabetically by States.

Minn., Crookston—Work has commenced on the clearing of ground for the park grounds which the N. P. has leased to city.

Minn., Winnebago City—R. C. MacCullough is working on a mausoleum at Spring Valley.

Ore., Portland—S. Benson, Oregon lumberman, has purchased 220 acres embracing the famous Gordon Falls, on the Columbia river and will convert it into a public playground.

KEEP TALKING---LINO FELT--"Between you and the weather"

If the cold of winter prevents you working on the outside, there is still time to save your customer money on his fuel bill by putting LINO FELT between or over the studding. This is **Inside** information. Talk to him about putting LINO FELT in the walls and roof of his home not only because he can save fuel in winter, but because LINO FELT keeps the heat out in summer, and the sound waves stop when they meet LINO FELT, insuring Comfort the year around.

UNION FIBRE COMPANY, --:-- WINONA, MINNESOTA

PROPOSAL ADVERTISING FOR BIDS

PROPOSALS FOR HIGH SCHOOL BUILDING, NEW ULM, MINNESOTA.

Sealed proposals, addressed to the Independent School District of the City of New Ulm, Minnesota, will be received by the Clerk of said district, Mr. A. F. Reim, at the office of the superintendent in the high school building, until five o'clock P. M., Tuesday, February 10th, 1914, for the furnishing of all labor and materials for the seven separate contracts:

- (e) TEMPERATURE REGULATION.
- (b) PLUMBING CONTRACT
- (c) HEATING CONTRACT
- (d) VENTILATING FAN EQUIPMENT
- (e) TEMPERATURE REGULATION
- (f) VACUUM HEATING SYSTEM
- (g) ELECTRIC INSTALLATION CONTRACT

for the High School Building to be erected by Independent School District of the City of New Ulm, Minnesota.

All of the work and materials shall conform with plans and specifications therefor as prepared by Messrs. Tyrie & Chapman, Architects, 320 Auditorium Building, Minneapolis, Minnesota, on file at the offices of the Clerk of said District and of the Architects, and also at the Builders' Exchanges in Minneapolis and St. Paul.

All proposals will be opened publicly by the School Board of said Independent School District at the office of the Superintendent of Schools in the High School Building in the City of New Ulm at eight (8) o'clock P. M., Tuesday, February 10th, 1914.

Plans and specifications for contracts (a), (c), (d), (e), (f), and (g) will be ready on and after January 10th, 1914; and for contract (b) will be ready on and after January 17th, 1914.

Plans and specifications for the per-

sonal use of contractors may be obtained from the Architects upon application, accompanied by a deposit of \$25.00 for (a)—General Contract—of which \$15.00 will be refunded to each contractor who returns the plans and specifications; \$15.00 deposit for each of the sets of plans and specifications for contracts (b) and (c) (which includes contracts (d), (e) and (f)) and (g) of which \$10.00 will be refunded to each contractor who returns the plans and specifications.

Each proposal must be accompanied by certified check equal to five (5) per cent of the total proposal, which check shall be made payable to Independent School District of the City of New Ulm, Minnesota. This deposit will be returned to bidders whose proposals are rejected, and to the successful bidder upon his entering into contract with said School District in accordance with his proposal and the giving of a satisfactory Surety Company bond to said District, the penalty of which shall be the full amount of the contract price, which contract and bond shall be entered into within five (5) days after the date of notification that his proposal has been accepted. Should the bidder fail to enter into such contract and bond within said time, said deposit shall be forfeited to said Independent School District of the City of New Ulm, Minnesota.

The School Board of said District reserves the right to reject any and all proposals.

Dated at New Ulm, Minnesota, this sixth day of January, 1914.

INDEPENDENT SCHOOL DISTRICT OF THE CITY OF NEW ULM, MINNESOTA.

By DR. GEORGE B. WEISER,

President.

ATTEST:

A. F. REIM,

Clerk.

NOTICE FOR BIDS.

For the Construction of Judicial Ditch No. 18, Beltrami County, Minnesota.

Notice is hereby given that the undersigned Auditor of Beltrami County, Minnesota, will on Tuesday, Jan. 27th, 1914, at 2 p. m., at his office in the court house in the city of Bemidji, Minnesota, receive sealed bids for the construction of Judicial Ditch No. 18, located in Towns 153-30 and 152 and 153-31, 7 miles from R. R., Beltrami County, according to the plans and specifications of the engineer now on file in the office of the clerk of court. Said ditch as surveyed by the engineer is about 10 miles long, and the estimated number of yards of dirt to be excavated is about 66,079.0 cubic yards; total estimated cost of the construction of said ditch being about \$11,741.00, including highway. Width of base is three feet, and average cut 4.7 feet. Bids will be received for the work as one job or for one or more sections of said work. Each bid must be accompanied by a certified check on a national bank or trust company for not less than ten (10) per cent of the bid, which shall be forfeited to said county if the successful bidder fails to enter into contract and execute a bond as provided by law. The successful bidder will be required to furnish a good and sufficient bond in the amount of the contract conditioned upon the faithful performance of said contract.

Bidders are requested to specify the time needed to complete the work.

No bid will be entertained that exceeds by 30 per cent the estimate of the engineer.

The right to reject any or all bids is reserved. The date for receiving said bids may be adjourned from time to time until the work shall have been all taken.

R. K. BLILER,
Engineer.

J. L. GEORGE,
Auditor of Beltrami Co., Minn.

PUBLIC BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Calgary—The finance committee has agreed to \$15,000 extra expenditure for the new police station.

Alta., Calgary—Citizens have voted \$125,000 for a municipal abattoir to be erected here; address city clerk.

Alta., Calgary—City council has purchased a site for the erection of the proposed industrial building, to cost \$247,500; new plans asked for from architects, Lawson & Fordyce and A. Pirie.

Alta., Edmonton—Plans have been prepared by A. M. Jeffers, city architect, for the new Central police station and fire hall, to cost \$350,000.

Alta., Stettler—A new court house is planned for this city, to cost \$40,000; address the mayor.

Ariz., Stafford—Meeting of city officials and citizens held to decide details in regard to issuing bonds for a modern town hall and jail to replace the one recently burned; address city clerk.

Iowa, Clinton—Bids received by city of Clinton, until Feb. 15, for a fire station to cost \$8,000; 33x66, 2-story, brick; John H. Ladehoff, architect. Foundation of concrete, vitrified and common brick, blue Bedford stone, composition roofing, metal cornice, double strength glass, hard wall plaster, yellow pine

flooring and interior finish; one bath room, electric lights, hollow tile, iron beams, plumbing.

Iowa, Eagle Grove—Voters will soon pass upon the plan to erect a city hall that will cost about \$17,000; address city clerk.

Kan., Topeka—Ancient Order of United Workmen is planning the erection of a lodge and office building to cost, \$150,000.

Minn., Brainerd—A section of the steam heating plant blew up a few days ago in the Crow Wing county jail; J. F. Smart, county auditor.

Minn., Chatfield—Plans are in progress by Claude & Starck, Badger Annex, Madison, Wis., for the city library; 34x56, 1-story and basement, \$6,000; figures will be taken in the spring; address W. A. Moore, city.

Minn., Hibbing—Architect Sullivan estimates that the cost of the third floor on the Alice fire hall, petitioned for by the residents of that suburb, would be about \$7,000; rough sketches of the proposed change will be made and submitted to the contractor for his figures.

Minn., Olivia—At a recent mass meeting it was voted to accept the \$15,000 offered by the state for an armory, with the understanding that Company H furnish a suitable site and \$1,000 in cash; plan provides for a building, 65x120, full basement, balcony with seating capacity of 150; will have officers' quarters, stage lockers and a large dining hall.

Mont., Billings—Secretary Fowler has been instructed to prepare incorporation papers giving the Chamber of Commerce the right to own property and install a public market.

Mont., Glendive—City council accepted plans of Architect Rivenes of Miles City, for the proposed new city hall building; estimated cost including heat, \$26,000; address city clerk.

Mont., Roundup—Plans for the city jail have been approved and a call for bids ordered published in a local paper; J. H. Grant, architect; address city clerk.

Neb., Red Cloud—Bids will be advertised for about Jan. 15 for the construction of the Webster county court house; 84x86, 3-story; cost \$60,000; W. F. Gernandt, architect, 513-14 Karbach block, Omaha; E. W. Ross, county clerk.

N. D., Wahpeton—Bids received by F. A. Burton, auditor of Richland county, until 2 p. m., Jan. 12, for the steel fixtures for six vaults in the court house; check for 5 per cent.

Ont., Port Arthur—Plans adopted for the erection of a new police station to cost \$30,000; address city clerk.

Ont., Port Arthur—Proposition voted on Jan. 5 for a court house and jail to cost \$175,000; address city clerk.

Ont., Port Arthur—Among new buildings to be erected this year are a city hall, markets, fire station, court house, extension to the harbor breakwater; address city clerk.

Sask., Battleford—Proposed to borrow \$15,000 for the purpose of completing the town hall; address city clerk.

Sask., Regina—The Retail Merchants' Association will petition the city council to establish a municipal abattoir; address city clerk.

Sask., Yorkton—Site has been purchased by the provincial government for a new court house; it is hoped a building may be put up the present year, but this may depend on an easing up of the financial situation.

Wis., Platteville—The sum of \$12,500 has been offered by the Carnegie library foundation for a library here; the city had asked for \$20,000; definite action has not yet been taken by the city authorities.

Wis., Racine—If settlement can be made with the contractors on the proposed \$250,000 court house, which Judge Fowler has ruled cannot be built within 40 feet of adjoining buildings, then it is proposed to remodel the present court house building and expend from \$35,000 to \$50,000 and by so doing give the county a building that will answer all purposes for some years. The county awarded contracts to the amount of \$250,000 before suits were brought to prevent the construction of a new building.

CONTRACTS AWARDED.

Iowa, Charlotte—Contract for the slate roof on the county farm here has been let to Parker Bros., Clinton, Iowa.

Mont., Livingston—Contract for 2-room building at county fair grounds awarded to Wm. Sworder.

Neb., Crawford—General contract has been let to Miller & Roseline, Falls City, Neb., for the city hall here, 2-story; work will start soon, it is expected.

S. D., Bison—Contract for the lumber for the new town hall has been given to the Western Lumber Co., at Haynes; 26x40, 1-story.

HOTELS AND HOSPITALS

Notes Arranged Alphabetically by States.

Ill., Galesburg—Work on the Hotel Custer will begin in the early spring. Structure will cost approximately \$200,000.

Ida., Idaho Falls—B. M. Rogers, Deer Lodge, is having plans prepared for a 4-story hotel; excavation for basement now proceeding.

Idaho, Lapwai—H. L. Wright will build a 2-story cement block hotel on Main st.

Iowa, Creston—It is stated that a new hotel is to be built on Maple st. and that a change will take place in the management of the Summit house.

Iowa, Davenport—Bids received by Temple & Burrows, architects, 63 McManus building, city, until Jan. 21, for the hotel to be built by the Black Hawk Hotel Co., D. R. Lane, secretary, Lane building; 128x150, 7-story and basement, \$350,000.

Iowa, Davenport—The Hawkeye hotel, for which bids will be asked soon, will be faced with Hy-Tex brick; semi-glazed terra cotta trimmings will be used extensively; kitchen walls to be of Hy-Namel brick; kitchen to be 60 feet square, 15 feet high.

Iowa, Des Moines—The Cargill hotel, owner by W. W. Wither, will have its capacity doubled when the work of remodeling the building adjoining the hotel to the east on Grand av. is completed; fifty or more rooms will be added.

Iowa, Dubuque—Specifications for the big hotel here are going forward in the offices of Marshall & Fox, architects, Chicago. The new plans do away with the service building

originally proposed for the Iowa street side and put the entire establishment on the Main street side in a fireproof reinforced concrete building. This will be eight stories and basement, 171½ feet on Main st. and 113 feet on 2d st., and will contain about 250 rooms, landlord's count. The exterior will be Bedford stone to the top of the mezzanine floor and above this a brick in color and appearance similar to that used in the Blackstone hotel, Chicago.

Iowa, Leon—Corporation being formed to build a modern hotel; plans by Easton, of Des Moines, Iowa; 100x108, 2-story and basement, 40 rooms; sleeping porches, steam heat.

Iowa, Reinbeck—Contract for enlarging the Christy hotel has been made with Miller Bros., Waterloo.

Kan., Eureka Lake (near Manhattan)—Bids received by Dr. S. T. Millard, 724 Kansas av., Topeka, Kan., until 10 a. m., Feb. 2, for a juvenile building at the Rebekah Odd Fellows' home; separate proposals at the same time for steam heat, plumbing and electric wiring; John F. Stanton, architect, 835 Kansas av., Topeka, Kan.; check for 3 per cent; Mrs. S. C. Foresman, secretary.

Kan., Wichita—Figures will be taken about Feb. 1 on the hotel to be built by the Travelers' Hotel Co., O. A. Boyle, manager, 125 N. Rock Island av., city; plans are now in progress by the architects, Richards, McCarty & Bulford, New Hartman building, Columbus, O., to be 100x140, 5-story and basement; cost about \$200,000.

Minn., Mesaba—It was expected that work on the Bray hospital would begin this week; Herman Anderson, Biwabik, has the contract.

Minn., Nopeming—New buildings proposed for the sanitarium for 1914 are as follows: cottage for advanced cases; capacity 24 to 30 patients; service building or additional accommodations for service in main building; cottage for nurses, two additional cottages for ambulant patients, each accommodating from 12 to 24 patients; superintendent's residence; central heating and power plant, barn; also a sewage disposal plant and increased water facilities.

Minn., St. Cloud—The Grand Central hotel is to undergo extensive improvements involving an expenditure of \$20,000; Dan L. Hayward, manager; R. C. Buckley, architect, city.

Minn., Willow River—A new hotel is to be built here, modern and handsome; 2-story; write Frank Laufenberg for information.

Mo., Kansas City—Plans are nearing completion for the hotel to be built by the Muehlbach estate, 17th and Main sts., Kansas City, Mo., 138x158, 12-story and basement, 400 rooms, cost \$1,000,000; Holabird & Roche, architects, 104 S. Michigan av., Chicago, Ill.; the lessee is Samuel J. Whitmore, care Laubersheim hotel, Los Angeles, Cal.

Mont., Billings—Among work under construction here the remodeling of the Northern hotel lobby will involve an expenditure of \$30,000 and the girls' dormitory at the Polytechnic will involve \$25,000; this last about completed.

Mont., Billings—A 4-story hotel is under consideration by Thomas McGinnis of Butte, to be located at the southeast corner of 2d av. N. and Broadway.

Mont., Sidney—A large 2-story frame hotel burned; loss \$10,000, insured for \$7,000.

Mont., Simms—Lots have been purchased by Dr. J. W. McCready, who will build a hotel.

Mont., Uln—A stock company of which J. E. Largent is president will build a new store and hotel building, to be 2 story, concrete blocks.

Neb., Hastings—A new city hall is in sight for early in the year and three fraternal orders burned out of a home by the destruction of the business block recently will build during the coming summer.

Neb., Norfolk—Sketch of a building to relieve the overcrowded condition of the state hospital for the insane is being prepared by Superintendent Guttery, to be submitted later to the state architect, who will prepare plans for a new building.

N. D., Antler—The Antler hotel, owned by Mrs. M. A. Kellogg, has been destroyed by fire; loss, about \$15,000.

N. D., Minot—Reported that a modern and up-to-date hotel, to be built by eastern capital, will go up here in the spring; site has been chosen, to be a 50-room, 3-story brick, fireproof construction, 50x100; F. W. Youngman, agent for the owners.

N. D., Wahpeton—The Wahpeton hospital owned by Dr. T. O'Brien, damaged by fire to the amount of \$1,000 or \$2,000.

Wash., Seattle—Architect John Graham, Lyon building, has completed plans for the construction of the 6-story and basement, 60x120, brick and mill hotel building, for P. J. Murphy; estimated cost, about \$60,000.

CONTRACTS AWARDED.

Minn., Chokio—Contract to the Beaulieu-Costello Co. for installing a heating plant in the Marlboro hotel.

Mont., Geraldine—Contract with E. C. Fuller, Lewiston, Mont., for the \$12,000 hotel building here.

Wyo., Guernsey—Contract for building the new Fechner hotel is held by W. J. Corrigan; work started.

FREE HELP WANTED ADVERTISEMENTS

Send your want ad to

The Improvement Bulletin

If you are looking for employment, or for an employe, The Bulletin offers you an opportunity to supply your need without the expense of advertising.

It will be run free
TWO WEEKS
on this page

Write your advertisement, attach blank and mail direct to The Improvement Bulletin, Minneapolis, Minn. The Bulletin is read in most of the large cities in the United States.

State your "want" in twenty words and attach the below coupon, properly filled out.

This offer *does not* apply to advertisements for persons to handle goods on commission or to advertisements soliciting business patronage.

CUT ON THIS LINE

THE BULLETIN EMPLOYMENT BUREAU

FULL NAME AND ADDRESS OF ADVERTISER MUST BE FURNISHED
FOR PUBLICATION OR ADVERTISEMENT WILL NOT BE CONSIDERED

Name.....

Street.....

City.....

State.....

PROPOSAL ADVERTISING FOR BIDS

PAVING.

Monticello, Iowa.

Sealed proposals will be received by the City clerk of the city of Monticello, Iowa, until 8 o'clock p. m., Feb. 4th, 1914, and then opened, for the construction of approximately 7,300 square yards of paving, 4,500 linear feet of combined curb and gutter, 2 catch basins, 100 linear feet of special combined curb and gutter, 40 lineal feet of 15-inch storm sewer. Bids on both cement concrete and Dolarway pavements will be asked. Payment to be made in special assessment certificates. Each bid to be accompanied by check payable to order of City Treasurer for \$500.

The City reserves the right to reject any and all bids.

Plans may be obtained of the City Clerk, by sending certified check for \$15.00 which will be returned, if plans are returned within ten days of receipt.

C. J. NORTHROP,
City Clerk.

NOTICE TO BIDDERS.

Proposals for Water Works System for the City of Wabasha, Wabasha County, Minnesota.

Sealed proposals for the construction of a complete water works system for the city of Wabasha, Wabasha County Minnesota, will be received up to 8 p. m. Tuesday, January 27, at the office of the City Recorder, Mr. J. M. Schouweiler, opened immediately thereafter.

The plans and specifications are on file and can be seen at the office of the City recorder of Wabasha, Minnesota, or at the office of the Oscar Claussen Engineering Company, No. 312-316 Commercial Building, St. Paul, Minnesota, or additional copies may be had of Engineers at \$5.00 per set to cover the cost of reproduction of same.

The plans and specifications are the property of the City of Wabasha, Wabasha County, Minnesota, and must be returned at the letting together with the bids or the bid will not be considered.

The work is to consist of the following approximate quantities; Division No. 1, being a distribution pipe line system consisting of about 6,480 feet of 12 inch cast iron bell and spigot pipe, 792 feet of 10 inch, 4,836 feet of 8 inch, 6,204 feet of 6 inch and 27 fire hydrants together with valves, specials, etc.

An alternate bid will be taken on an equal amount of 10 inch cast iron pipe in place of the amount of 12 inch as given above; also alternate bids will be received as called for on the bidding form.

Division No. 2, being the furnishing and installation of a reinforced concrete reservoir of approximately 500,000 gallons capacity.

Division Number 3, being the building and installation complete of a concrete curbed well about 40 feet deep and 8 feet in diameter, and an alternate well of the same depth but 12 feet diameter.

Division No. 4, being the furnishing and installation of at least a 400 gallons capacity triplex power pump, either double or single acting, with motor installed complete. The above work is to be furnished and installed complete together with all accessories.

A certified check made payable unconditionally for the sum of \$200.00 must accompany proposal for each division of the work or a certified check for \$800.00 must accompany bids on the entire work. Alternate divisions such as furnishing pipe, etc., separately if called for on bidding form must be accompanied with a \$200.00 check. These checks are to be made payable unconditionally to the City Recorder as a guarantee of good faith on the part of the contractor that he will enter into a contract if his proposal is accepted. The City of Wabasha, Wabasha County, Minnesota, in its officers reserves the right to reject any or all bids.

Attest: J. L. GENGNAGEL,
J. M. SCHOUWEILER, Mayor.
City Recorder.

(Seal.)

BRIDGE, STATE ROAD.

Sealed bids will be received at my office in the City of Hastings, Minn., until 10 o'clock, A. M., on February 3rd, 1914, for building State Bridge No. 740 on a State Road in the Town of Ravena, County of Dakota, State of Minnesota.

The superstructure will be 53 feet, Span 120 feet, Roadway 16 feet, Floor concrete.

Plans and specifications may be seen at my office or at the office of the State Highway Commission, on which bids must be made and each bidder also may submit a separate bid on plans and specifications furnished by himself which must first be approved by the State Highway Commission.

Each bid must be accompanied by a certified check or bidder's bond for not less than five per cent of the amount of bid, payable to me. All bids must be upon the blank forms furnished by the State Highway Commission.

The committee reserves the right to reject any or all bids.

Dated this 8th day of January, 1914.

P. A. HOFFMAN,
County Auditor.
Hastings, Minn.

WANT ADS SPECIAL NOTICES

NOTICES under this heading will be inserted at the rate of fifteen cents per line, each insertion; no notice inserted for less than 50 cents.

FOR SALE—GAS ENGINE.

"For Sale—Gas Engine, 16 H. P. Stationary, friction clutch pulley, magneto; A-1 condition, about half price. Can be seen at 414 1st st. N.

PORT HURON MACHINERY CO.,
Minneapolis."

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

Mo., St. Louis—Plans being prepared by Kennerly & Stiegemeyer, St. Louis, for a theater to be erected on North Side by Northland Theater Co., at cost of \$100,000. W. Brennen, H. G. Cook and others are incorporators.

Mo., Webster Grove—Sketches have been completed by the architect, Klipstein & Rathmann, Chemical building, St. Louis, Mo., for a theater and natatorium; 80x127, 2-story; owners, R. K. Kauffman and A. J. Meier and associates.

Mont., Billings—The addition of three stories is planned for the Babcock theater building.

Mont., Butte—Ivanhoe block, occupied by theaters, badly damaged by fire; loss \$15,000.

Mont., Cascade—Dangneiu hail burned; loss \$3,200; owned by Wm. Dangneiu.

Mont., Corvallis—The Farmers' Society of Equity are planning a public hall and gymnasium.

Mont., Harlem—Bids received by R. H. McGinness, secretary, Odd Fellows' lodge, until Feb. 2, for a 2-story frame hall, 36x76; check for 5 per cent.

Mont., Missoula—The Scandinavian Brotherhood contemplates building a lodge hall the coming spring, to cost from \$12,000 to \$15,000; Ole Bakke, architect, will probably prepare plans; Oscar Hilding, president.

Neb., Fullerton—Details for the Odd Fellows' building, for which bids will be taken Feb. 15, are as follows; 60x62, 2-story, cost \$9,000; brick and stone, Mankato stone, common and Matt brick; asbestos roof, metal cornice, double strength and plate glass, steam heat, hardware, yellow pine floors and finish, electric and gas fixtures, decorating, ventilators, furniture; address R. O. Richardson, owner.

Neb., Hastings—The Knights of Pythias are considering a project to build a lodge home.

Neb., Hastings—Building occupied by the Gaston Music Co., Woodmen of the World and Knights of Pythias burned to the ground; loss, \$100,000.

Neb., Horace—Work has been started on the superstructure of the building for the Woodmen of the World.

N. D., Grand Forks—The \$200,000 Masonic home is enclosed and no further work will be done until early in the spring.

Sask., Saskatoon—The Empress theater damaged by fire to the extent of \$1,000; building owned by F. Cahill.

Wis., Cream City—Building known as Maloney's hall, occupied by John P. Marek as a saloon and dance hall, burned; loss, \$2,500; partly insured.

Wis., Green Bay—The Green Bay lodge of the Loyal Order of Moose have voted to build a \$50,000 club house and auditorium.

Wis., Phillips—The Odd Fellows will probably build a new hall the coming summer.

Wis., Racine—The lodge of Moose will erect a new club house to cost about \$20,000.

CONTRACTS AWARDED.

Mont., Dillon—Contract awarded to P. P. Vreeland of Fred F. Wilson & Co., Bozeman, Mont., for plans for the city hall building; 50x100, 2-story and basement.

Wis., Madison—Contract for the picture theater to be built here by H. H. Hile, 1326 Morrison st., has been let; masonry to B. F. Oakey, 423 Baldwin st., and carpentry to Geo. Vogel, 913 Williamson st.

SCHOOLS

Notes Arranged Alphabetically by States.

***Alta., Carlsbad**—The Kimball school was burned, insured, will be rebuilt soon.

Iowa, Alton—A special election will be held at Paullina to vote on proposition of enlarging the school building.

Iowa, Clarion—At special election Dec. 30th, in district of Rowan, \$275,000 bonds were voted.

Iowa, Craig—School district of Craig voted \$4,000 bonds.

Iowa, Livermore—Plans prepared for a 2-story brick school house, 60x84; fireproof, steel frame, iron, terra cotta, cut stone, common and pressed brick, steam blower heat, electric light, gas, sheet metal sky lights, composition roof, common metal plaster, wire glass, maple floors, yellow pine and oak finish, rolling partitions; cost \$25,000; bids opened in January.

Iowa, Lone Tree—The \$30,000 proposed school house will be built.

Iowa, Pella—The Pella Commercial association has requested the board to place before the people the proposition to buy a site for a new school building.

Minn., Barrows—The contract for the proposed \$12,000

school will be let this month by Vernon J. Price & Co., architects of Duluth.

Minn., Blue Earth—Bids will be received for the erection of a school house in district No. 104; check for 5 per cent; letting of contract will be made Saturday Jan. 24; Albert Tillia, clerk of school board.

Minn., Duluth—All bids for the erection of the Munger school must be in by Jan. 24.

Minn., Fulda—Fire damaged the school building here, about \$800.

Minn., New Ulm—Bids for the new high school building will be opened Feb. 10th, at which time contract will be let. Geo. A. Chapman, architect, of Tyrie & Chapman, Minneapolis, will present plans to board Jan. 6th. Building to be modern throughout. See official advertisement in the Improvement Bulletin this week.

Minn., Oak Park—Fire destroyed the school house in district No. 34.

Minn., Red Lake Falls—Fire burned the school house in district No. 36, Red Lake county.

Minn., St. Cloud—Architects and landscape engineers are making a topographical survey of the site for the new normal.

Mont., Butte—Bids received until Jan. 13, for construction of ice storage house at the industrial school; plans on file at office of H. Kemma, architect, Thomas building; Louis T. Gainor, chairman; Thomas Richards, clerk, district 1, Silver Bow county.

Neb., Hooper—The farmers of Ridgley township are contemplating erection of a school building.

***N. D., Churches Ferry**—A new building will be erected for the consolidated schools in Irving school district.

N. D., Grand Forks—A \$300,000 school building will be erected here; first unit to be built next year; cost \$125,000.

N. D., Mott—The state high school, Heyward, is contemplating erecting a new high school soon at Ashley.

S. D., Canova—Rock Creek item—Plans are being made for erection of a school house here, brick construction.

Wash., Seattle—Following bids received on the 2-story brick school building: Hans Rathe, 6726 20th av. N., at \$21,525; Halbert Construction Co., \$21,635; Manhattan Construction Co., Central building, \$21,996; Edward A. Nelson, \$22,865; Ralph Wheaton, \$24,500; W. B. Lance, \$24,000; Walter White & Walter, \$24,995; Eckman & Mowatt, \$25,895; H. F. Allen, \$25,916; contract awarded to Hans Rath; V. W. Voorhees, architect.

Wis., Beloit—General contract let to John Schneiberg, Beloit; plumbing, Sanitary Plumbing Co., Beloit; heating, Rockford Heating & Ventilating Co., Rockford; for Merrill school; F. H. Kemp, architect, Beloit.

Wis., Fond du Lac—Preparations are being made for the installation of an electric light plant in St. Lawrence college.

Wis., Wild Rose—Contract for the North Lake high school building awarded to C. M. Radley of Wild Rose; pressed brick Bedford stone trim, slate roof; C. M. Radley, contractor and builder.

BIDS WANTED.

***S. D., Yankton**—Bids received by Mount Marty Hospital Association until 11 a. m., Feb. 16, for a brick hospital, heating, plumbing, electric and elevator work. Officially advertised in this issue of the Improvement Bulletin.

Iowa, Carroll—Bids opened Jan. 15 for a 2-story brick school house, 54x80; plans by J. R. Smith, architect, Lincoln, Neb.; steel beams, iron stairs, joist hangers, fire escapes, tile, fireproofing, lime cut stone, common and pressed brick, hollow, steam heat, electric lights, sheet metal cornice, composition roofing, corner beading, slate and maple floors, pine finish, rolling partitions; bids taken by secretary; cost \$16,000.

Iowa, Marshalltown—Bids will be received Jan. 26, 7 p. m. for erection of a school building in Liberty township, consolidated school district; plans at office of superintendent, Marshalltown; address, J. R. Howard, president school board, Clemons, Iowa; cost \$12,000; fireproof construction.

Mont., Big Timber—Bids received Jan. 20, for construction of a school house in district No. 52, Wheeler-Butte. Plans on file at office of Mrs. Jesse F. Evans, county superintendent. Mrs. Frank Wilson, clerk.

CONTRACTS AWARDED.

Iowa, Sidney—Contract awarded to A. C. Murphy for erection of a school building at Mickelwait.

Minn., Montevideo—The following contracts have been awarded on the new school building, general contract let to N. H. Leighton Co., Minneapolis, for \$90,471; plumbing to W. F. McGuire at \$5,056; heating and ventilating to Adamson Co., of St. Paul, at \$19,474; electric wiring, contract to Olson & Oettinger, St. Paul, \$1,675; ventilating to Johnson Service Co., Minneapolis, \$2,491; total of contracts \$120,417; building to be modern throughout, 111x150, 3-story. Work to begin about Mar. 1. Wm. B. Ittner, architect, St. Louis, Mo.

Neb., Stapleton—Contract awarded to firm of Podges & Isaugh of Stapleton for construction of school building here.

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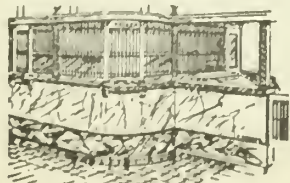
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MILLS AND FACTORIES

Notes Arranged Alphabetically by States.

Idaho, Priest River—J. R. Stewart, local, and C. W. DuBoise of Tacoma, will incorporate company, capital \$10,000, for manufacture of gun site invention, factory to be built as soon as site is secured.

Idaho, St. Maries—Stock for a creamery building has nearly all been subscribed.

Ill., Moline—Construction work will begin soon on a large building by the National Licorice Co., 4th av. and 23d st., (candy factory) work to start by the Lorenz Construction Co. who have contract, at \$27,250; plant will be 144x136, 2-story and basement, ready by April 1, 1914; cost completed about \$40,000.

Iowa, Akron—A broom factory, canning factory and brick yard will be located here.

Iowa, Alden—A new stone crusher factory will be erected by the Hall Roberts Co.

Iowa, Bancroft—The Howe Steel Automobile Co. will erect a factory in the spring for manufacture of all metallic parts; Dr. Howe, owner.

Iowa, Burlington—The Iowa Biscuit Co. is erecting a factory, 5-story with tapestry brick front; Geo. H. Washburn, architect, Burlington, Iowa, contract let to John Thyne.

Iowa, Council Bluffs—Plans are being discussed for erection of a threshing feeder factory here; company to be formed by Council Bluffs business men.

Iowa, Council Bluffs—A new creamery will be erected by Bloomer Ice & Cold Storage Co. soon; cost \$15,000; brick and concrete construction, 100x37, modern throughout, 5-story, Fred E. Hurd, manager and president.

Iowa, Davenport—The Independent Baking Co., Klaus & Sadiant Ice Co., Charles Schick and E. L. Goff have purchased sites for new factories.

Iowa, Emmetsburg—It is proposed to rebuild the factory at Rinstad recently burned.

Iowa, Waterloo—The Armstrongs let contract for their new factory building, 60x60, to be completed Feb. 1.

Kan., Wichita—A 3-story and basement flour mill will be erected here, 50x120; cost \$100,000; owner, Wichita Flour Milling Co., care W. H. Kinney, Howard Mill; owner will select architect about Jan. 8.

Minn., Fergus Falls—H. K. Grinager will build a factory for his Northern Woolen Co. business, 50x70, brick 2-story, modern.

Minn., Minneapolis—Machinery for the new concrete workhouse was authorized by the board of charities; Frank McDonald, superintendent.

Minn., Stillwater—Fire damaged the Jesse Foundry, \$3,000.

Minn., Willmar—Contract for the Willmar Foundry building was let to J. H. Olson.

Mont., Billings—A cement culvert factory will be erected here by W. J. Scott and J. F. Kelly; cost \$10,000.

Mont., Billings—C. W. Pullen of Pullen Bros. Co., Minneapolis, is looking for a suitable site for Oxyacetylene welding plant; cost \$2,000.

Mont., Billings—W. C. Renwick is building addition, 50x90, to old city barn and remodeling into a 2-story warehouse, 50x140.

Mont., Helena—Damage of \$1,000 resulted from a fire which entirely consumed the wagon shed of the E. W. Colby dairy total loss.

Mont., Huntley—The Western Bond & Mortgage Co. will erect a large canning factory; cost \$30,000.

Mont., Missoula—Proposition is being discussed for location of a canning factory here.

Mont., Polson—Arrangements are nearly completed for a saw mill at this place, by the Dewey Lumber Co. and James Harbert.

Mont., Stanford—W. W. Galt, Commercial Club, has started movement for a creamery here.

Neb., Buffalo—A hog cholera serum plant will be erected here; S. E. Pecht, interested.

Neb., Fullerton—Hon. W. F. Porter is organizing a company to erect a creamery here.

Neb., Omaha—The Baker Ice Machine Co. has secured figures and plans for a plant at Walthill, Neb., machinery, vat, piping, etc., cost \$6,000; total cost, \$8,000, 24x40, ammonia compressor, 25 h. p. electric motor.

Neb., Ravenna—The interior of the Ravenna Electric Light Co.'s engine room was damaged by explosion.

Neb., Tecumseh—Work will commence this week on the factory for the Tecumseh Crystal Pure Ice Co.

Neb., Wynot—The Yankton Brick Yard selected the following officers, Wm. Fantle, J. A. Danforth, D. B. Gurney, Edw. Klopping and Dr. Hohf; company will erect a plant soon.

Wis., Antigo—Work will soon start on the new mill to be erected by the Wausau Log & Land Co., at Malvern.

Wis., Onalaska—Foundation for the new canning plant has been completed; carpenter will begin work at once.

Wis., Rhinelander—The Wausau Log & Land Co. will erect a mill at Malvern in the spring.

Wis., River Falls—Bids received until 2 p. m., Jan. 15, for erection of a co-operative creamery building by H. A. Hagestad; cement block lined with hollow tile, 66x36, with annex boiler room, 24x26, work to begin early in spring; plans on file at creamery; check for \$200.

Wis., Sturgeon Bay—Fire destroyed the big mill of Thomas F. Carmody of Egg Harbor; total loss \$2,000.

Wyo., Basin—E. E. Lonabaugh plans to build a creamery soon.

CHURCHES

Notes Arranged Alphabetically by States.

Iowa, Wesley—Plans have been about completed by the Ward Appointment for construction of a new church.

Minn., East Grand Forks—Presbyterians have begun movement for erection of a \$20,000 church to replace one recently burned.

Minn., Gentilly—A new Catholic church will be built by the Catholic association; cost \$250,000.

Minn., Little Falls—Proposition is being discussed for the erection of a new M. E. church; Dr. W. H. Jordan, district superintendent.

Minn., Mapleton—H. C. Gerlock, architect, Mankato, Minn., has prepared plans for the English Lutheran church, 36x75, concrete and stone foundation, pressed brick, lime stone, cedar shingle roofing, galvanized iron cornice, art glass, hot air heat, stucco plaster, maple floors, oak finish, blackboard, cementing, decorating, dumb-waiter, electric lights, fireproofing, iron columns, plumbing, ventilating, seating.

Minn., Pease—Plans are being discussed for erection of a new church.

Minn., St. Cloud—A meeting for plans and specifications was held for erection of a Catholic church.

Minn., Virginia—About \$6,000 is being expended on repairs of the Swedish Lutheran church here. Work done by contractor Andrew Grande.

Mo., Conception—Anton Zwack of Dubuque, Iowa, was awarded contract for erection of large Roman Catholic church. Anton Zwack, contractor, Bell block, corner 13th and King sts.

Mont., Billings—Bids are asked for at once for the erection of a new First Christian church building; work to start at once; cost about \$15,000.

***Mont., Ismay**—Petition is being circulated for erection of a church by the Catholic association.

Neb., McCook—People of E. McCook are campaigning for funds to enlarge their church and Sunday school rooms.

N. D., Cooperstown—A church will be erected on farm of Per. Person, plans not decided on yet; J. Johnson and J. Dahlbom, P. P. Person, committee.

N. D., Forman—Bids received Mar. 12, 1914, for erection of a Catholic church; plans and specifications on file with Father McArdle, Cogswell, N. D.

Wis., Marshfield—Plans for the new Evangelical Congregation of Dorchester have been drawn by Gust Krasin; brick construction with Bedford stone, field rock foundation, construction to begin in spring.

Wis., West Bend—Bids will be received until Jan. 27, 2 p. m., for erection of and completion of a solid brick and stone church, by Rev. P. J. Stupfel, pastor; Parkinson & Dockendorff, architects, La Crosse, Wis.; check for 2 per cent.

GARAGES AND BARNs

Notes Arranged Alphabetically by States.

BUILDING PERMITS.

Iowa, Algona—B. F. Kliet of Titonka is planning to build a garage at Wesley.

Iowa, Anita—Fire destroyed the garage of John Ruggles.

Iowa, Burlington—Work is progressing rapidly on the Jesse Phillips garage.

Iowa, Coin—E. S. Lingo, Norwich, will build a large garage.

Iowa, Des Moines—Des Moines Flour & Feed Co., capital \$50,000; Geo. Butcher and others.

Iowa, Mason City—Hawkeye Supply Co., capital \$50,000; C. E. Shannon, G. B. Pray, and others.

Iowa, Norwich—E. S. Lingo is erecting a garage.

Iowa, Jewell—Geo. and Lewis Charlton are building a modern garage at Randall.

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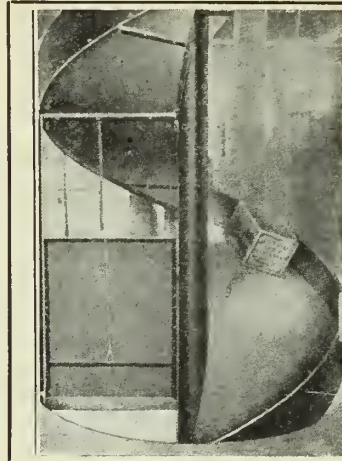
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Iowa, Storm Lake—E. J. Edwards has commenced erection of a barn, modern.

Iowa, Washington—Work has started on the new Jesse Phillips garage.

Kans., Jewell City—(East Allen item)—Lars and Christ Hanson will erect a new garage.

Mich., Detroit—Anthony Stefanowski, 724 Ford building will build a 1-story garage, 20x20, 724 Field av., architects, Preston & Walker, 1932 Dime Bank building, architects, taking bids; hollow tile construction, (Natco tile).

Minn., Blooming Prairie—Fire destroyed the large barn of L. Virtue; loss \$12,000.

Minn., Breckenridge—Plans by architect, F. L. Marsh, Champlin, Minn., for erection of a large barn for H. L. Shirley, 36 x88, with two row arrangements for cows and horses, frame construction, water supply, probably "fresh from the well," system.

Minn., Duluth—Franklin Land Co., capital \$50,000; E. F. Alford.

Minn., Edgerton—B. F. Warren will erect a large barn.

Minn., Floodwood—Hingley & Brandmier are preparing to build a large modern stock barn; work to commence soon.

Minn., Karlstad—Fire destroyed the livery barn of I. J. Lagerquist.

Minn., Long Prairie—Haakon Hanson is making excavation for the large barn he contemplates building.

Minn., Mankato—H. B. Perrin & Son will build an addition to their garage, 22x150, 1-story and basement; cost \$5,000.

Minn., Oklee—A. J. Lillo of the firm of Lillo & Hoveland will build a modern garage.

Minn., Pine City—Corn & Clover Land Co., H. W. Harte and others; capital \$30,000.

Minn., St. Paul—Metropolitan Investment Syndicate Co., John A. Belmeur, S. S. Kerr and others; capital \$50,000.

Minn., Winona—A large general purpose barn will be erected by the Briarcomb Farm Co., 36x124, hollow tile stable walls, remainder of building except floor, of frame construction, cement floors, and creosoted paving blocks, cow stalls of steel, with cement mangers, young cattle and calf pens, of steel, water supply, gambrel roof, hay driveway on second floor, several feed bins; two hollow tile silos, 16x36, with hollow brick arched roofs in connection, ventilating system. A machinery storage building, 28x70, including work shop, and storage loft, entire length of building, frame construction, foundation of cement and hollow tile. A swine building, 23x30, 8-foot side walls, half mansard roof, tile walls, frame roof, cement floors, and creosoted blocks, steel partition, water supply.

Neb., Fullerton—A 1-story garage, 50x120, will be built by Kramer & Abel, Fullerton, brick construction, general contract let to T. V. Jackson & Son, Fullerton, architects, Chas. F. Wurdman, Columbus, Neb.; cost \$7,000.

Neb., Neligh—R. E. Prautman is building a public auto garage.

N. D., Barney—H. M. Bailey is building a large cattle barn, 24x48.

N. D., Hansboro—Vang & Nelson are making extensive improvements to their garage.

N. D., Napoleon—J. R. Thompson is having a large garage erected.

N. D., New England—Fire destroyed the large barn of the New England Horse Co., loss about \$6,000.

N. D., Tower City—A horse barn, 32x52 will be built by E. A. Drew of Minneapolis, wood construction, gambrel roof, 16-foot posts, floors in alleys of cement, in stall of plank laid on cement, feed bins and water supply. Plans by architect, F. L. Marsh, Champlin, Minn.

S. D., Badger—A dairy barn will be erected by P. R. Crothers, tile construction, cement floors and creosoted blocks, upper story and gambrel roof, wood, steel stalls, partitions, stanchions, and cattle pens, ventilating system, water supply, to water cows in stall, litter carrier; separator room, two silos, one tile silo to be built, with connecting silage rooms, and man-lift to second story. Architect F. L. Marsh, Champlin, Minn.

Wis., Fennimore—Aug. J. Maso and Jos. Whitish will erect a large garage, 60x120, brick construction, work to commence at once.

Wis., Green Bay—Anderson & Williams, architects, Green Bay, Wis., have prepared plans for a garage for J. J. Hoberg, general contract let to Fabry Construction Co., Green Bay, Wis., fireproof construction; cost \$15,000.

Wis., Marshfield—Following persons will erect barns in 1914: Geo. Eckes, Chas. Heckel, Nick Eckes, Frank Eilbesz, Matt Kunesch, Reigle Bros.; Geo. Sprang will have charge of carpenter work of all.

Wis., Milwaukee—A 1-story garage will be erected, owner's name withheld, plans in progress; architects, H. C. Hensel, 402 Caswell building; cost \$6,500, brick, composition roof.

Wis., Shawano—The Schweers Hardware Co. will build a new garage, 40x80.

BUSINESS BUILDINGS

Notes Arranged Alphabetically by States.

Alta., Calgary—Fire destroyed the whole business section of the town of Didsbury; estimated loss \$250,000.

Alta., Cheadle—Fire destroyed the F. H. Amidou's hardware store building.

Iowa, Bloomfield—Fire destroyed several business houses; loss about \$15,000.

Iowa, Council Bluffs—The local grocery store of Browder & Daniels as burned; loss about \$25,000.

Iowa, Davenport—The Independent Baking Co. will soon erect a new building; cost \$200,000.

Iowa, Dubuque—The William Hanson Commission Co. will erect a 3-story store building, fireproof.

Alta., Dunmore—Fire destroyed the building and store of John Crane, may be rebuilt soon.

Iowa, Mason City—Fire damaged the block of F. E. Keeler, \$20,000; Sander's cafe and Bayz Bros. candy kitchen were burned.

Iowa, Mason City—The Pray Bros., of Fort Dodge, a plumbing and heating firm, will erect a new building here.

Iowa, Mason City—A triple business block will be erected on west side of street between 4th and 5th, by Ed. Woodward, C. H. Keeney and Bert Farrer. Cost about \$25,000.

Iowa, Stockton—Fire damaged the general merchandise store of L. Schlapkohl about \$3,000.

Iowa, Thor—Plans prepared by architect, J. W. Bradford, Fort Dodge, Iowa, for construction of a bank building by the Thor Savings Bank, brick, fireproof, 2-story, 25x60; cost \$8,000. Bids ready Jan. 8, taken by architect; steel beams, tile and reinforced concrete fireproofing, lime, cut stone, common, pressed and hollow brick, steel shutter, steel vault doors, hot water heat, sky-lights of galvanized sheet metal, gravel roof, corner beading, plate, prism, wired and art glass, sidewalk lights, tile floor, marble base, interior tile and maple floors.

Minn., Adams—J. P. Krebsbach plans to erect a large brick store building for his furniture, hardware and undertaking business, 2-story; S. M. Klapperich will erect a cement block blacksmith shop.

Minn., Breckenridge—The Campbell Mercantile Co. will build a large solid brick block, 90 feet long, with basement; Voss & Gaylord are planning to build addition to their garage, concrete construction.

Minn., Caledonia—Anton Hosch is enlarging building occupied by the Caledonia Implement Co.; 18-foot, 2-story addition.

Minn., Fairmont—Plans have been submitted to the directors for the remodeling and enlargement of the Security Bank building.

Minn., Hibbing—Vincent Ruspino is building a store building at Riverton.

Minn., Hokah—Fire destroyed the store building of H. P. Krog, estimated loss \$4,000.

Minn., Minneapolis—Work will begin in May on the proposed 20-story First National Bank-Soo Line office building at Marquette av. and 5th st. Architect Robert F. Gibson, New York.

Minn., Mountain Lake—A garage is being erected by Mr. Pope, fireproof, 2-story.

Minn., Pease—John DeRose is erecting a machine shop, 24x60, cement floors.

Minn., Perham—Brick work has been started on the Marcel warehouse.

Minn., Pine City—Work will commence on the State Bank in the spring, remodeling and enlarging, building, pressed brick front and Bedford stone, modern throughout.

Minn., St. Paul—The New Merchants and Miners State Bank of Ironwood, Michigan, will remodel their bank building and entirely equip the interior with a modern banking room. Contract has been let to A. Moorman & Co., St. Paul. There will be a new granite front, interior will have Italian marble counter, wainscoting, tile floor, ornamental plaster, cornice, and beam. Indirect lighting fixtures; decorations in oil colors, etc., cost of improvement \$10,000; work to be completed April 1, 1914.

Minn., Thief River Falls—A \$100,000 business block will be erected here.

Minn., Waubun—Wm. Vestecka is building a large addition to his implement store building.

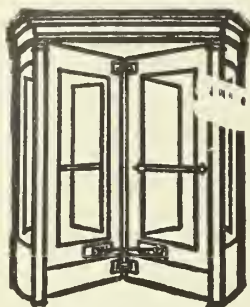
Minn., Winona—The Winona Savings Bank plans to erect a modern bank building in spring.

Minn., Worthington—Smith-Implement Co. erecting a new building, white brick, concrete foundation, 2 sides to be entirely of glass.

Mont., Anaconda—The business block of McBride & McBride will be rebuilt.

Mont., Billings—Buildings in prospect for 1914: Hart-Albin building, Broadway and 2d av., \$100,000; three additional

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stories on the Babcock building, Broadway and 2d; 3-story building adjoining Gazette on 27th st. by Austin North; a 4-story warehouse by Charles M. Bair, on Minnesota av. between 29th and 30th, cost \$200,000; a 3-story office building on 1st av. N. between 29th and 30th to be built by Berryman Bros., cost approximately \$50,000, 60x140, modern throughout.

Mont., Billings—The Farmers' Trading and Loan Association is erecting an 8-story office building; cost \$250,000. Montana Power Co., a 4-story office building, \$150,000.

Mont., Billings—C. M. Bair will build a 4-story warehouse; cost approximately \$200,000; 100x130.

Mont., Butte—Fire damaged the Standard Baking Co.'s plant.

Mont., Chester—The building owned by C. E. Briggs and occupied by W. J. Dow and Dinks Carlson, as a pantorium, was burned.

Mont., Great Falls—Ford Bros. will erect a bank and office building, 100x150, reinforced concrete construction, fireproof, 5-story; plans by architect, Henry Hall Johnson, 1044 Henry building, Seattle, Wash., steel beams, iron fire escapes, reinforced concrete fireproofing, granite, cut stone, terra cotta, gray common pressed brick three steel shutters, steam heat, electric lights, gas for dentists, composition roof, plate and wired glass, sidewalk lights, interior marble finish, composition tile floors, birch finish, to elevators (passenger), one freight elevator; bids taken about Feb. 15, by owner, Ford Bros.

Mont., Huntley—Brooks Bros. have begun work on their new pool hall.

Mont., Libby—The Shaver News Co. will soon erect a large lunch counter and rooming house.

Mont., Livingston—Building of O. M. Harvey burned, loss about \$3,000.

Mont., Livingston—The First State Bank will have a temporary roof placed on its property which was destroyed by fire, until a new building is erected.

Mont., Miles City—The lumber sheds and 2-story frame house owned by the Cardell-Ridge Lumber Co., Billings, burned.

Mont., Rexford—Wm. Douglas of Eureka will erect a modern 2-story building for pool hall and hall.

Mont., Roundup—Work has started on new building by contractor, W. E. Wynne, for use as a postoffice; 1-story, 18 x115.

Neb., Alliance—Work will soon begin on the Newberry building, plans being drawn by architect, O. J. Hehnke, of Scotts Bluff; 50x140, 3-story, with basement, brick construction throughout, estimated cost \$25,000.

Neb., Cody—Work has commenced on erection of the Gaeth pharmacy building by I. C. Stotts.

Neb., Creighton—The Cedar Rapids Oil Co. of this city are putting in local distributing station.

Neb., Grand Island—Excavation is being made for erection of a 2-story brick building which will be erected by Emil Rickert.

Neb., Grand Island—Excavation is being made for a new 2-story brick building by Emil Rickert.

Neb., Grand Island—Architect Kirschke is preparing plans for a building which John Allan contemplates building for a real estate office, to be either 2- or 3-story, fireproof, marble interior, steel fixtures, enamel terra cotta exterior.

Neb., Hastings—Fire destroyed the Kaufmann store, general merchandise store at Kenesaw, about \$15,000 stock carried.

Neb., Hayes Center—Charley Crosby, contractor of Maywood, is here figuring on new propositions.

Neb., Kearney—M. Bartz will rebuild brick business building, fireproof work to begin in spring.

Neb., Lincoln—J. H. Grosvenor will build a 2-story building in place of a 1-story as planned.

Neb., Neligh—Hans Lorenzen will build a business structure, 96x130, brick construction.

Neb., North Platte—J. A. Crowder will erect a new business building in the near future.

Neb., North Platte—H. L. Gaunt is erecting a modern concrete business building.

Neb., Omaha—With an expenditure of \$350,000 the United States National Bank will build 4 stories early in the coming year at present location.

Neb., Silver Creek—Roth & Kula will erect a 2-story building, brick; G. W. Clutter will also build.

N. D., Bismarck—F. C. Davies has commenced erection of a 40-foot extension to his property, occupied by the Brunswick pool hall; brick.

N. D., Conway—Fire destroyed the store of Mr. Borachek; loss \$50,000.

N. D., Douglas—Fire destroyed the pool hall of Alfred Johnson and meat market of Heath & Berg; loss about \$5,000.

N. D., Ellendale—Fire destroyed the store of W. H. McPherson, loss estimated at \$15,000.

N. D., Fairview—Fire destroyed the building of the Model

Grocery, Winkes building and the Boston Store, J. E. Winkes, loss \$4,000; Boston Store owned by Herman Marcovitz, \$8,000; Model Grocery, \$3,000.

N. D., Fairmont—The Russell Threshing Machine Co. will erect a large warehouse here.

N. D., Forbes—Fred Kingert has purchased the blacksmith shop from Sprouse & Filbert, and will build an addition to same for a garage.

N. D., Grand Forks—The large general store of the Boraechek General Mercantile Co. of Conway was burned; loss estimated at \$50,000.

N. D., Grand Forks—F. E. Vorachels, merchant of Conway, whose large mercantile store was burned will rebuild.

N. D., Hettinger—Dick Kane will open a pool and billiard hall in Ismay, Mont.

N. D., Marmarth—Rasmussen & Holman are building a large ice house.

N. D., Minot—R. T. Frost has prepared plans for a concrete cold storage house for the Northwestern Cold Storage Co., Minot; fireproof, 1-story and basement, 50x115; cost \$15,000; bids received April 1, by owner; reinforced concrete fireproofing, rolling or hinged shutters, electric light, metal lath; F. L. Householder, general manager.

N. D., New Rockford—F. C. Davies has commenced erection of a 40 foot extension to his property, brick construction.

Ont., Port Arthur—A new company has been formed, under name of the Bertrand-Lockhart Lumber Co. who will erect buildings and improve yards; work to begin at once.

Ont., Pt. Arthur—The Alberta Land Co. will start work soon on the new building to be known as the "Maudsley Court." Cost \$100,000 plans prepared.

Sask., Regina—Plans are being made for erection of a warehouse here by the Canadian Consolidated Rubber Co. of Winnipeg, Calgary and Montreal; cost about \$40,000.

S. D., Fairview—A \$70,000 cement block building, 75x60, is being erected by O. L. Peters for use as an implement store and cafe.

S. D., Sioux Falls—The State Bank & Trust Co. will erect an 8-story building, modern, bank and office building, lower story of lime stone and upper stories brick trimmed with lime stone, cornice of same, two high speed electric elevators, upper floor corridors marble, office trimmed in oak; capital \$200,000; W. E. Stevens, president, W. K. VanBrunt, vice president.

S. D., Victor—Mrs. Carrie Nelson and Miss Selma Fagre will build a restaurant and confectionery store.

S. D., Watertown—Fire destroyed the lumber yards and building of Melham Bros., at Florence, damage \$10,000.

S. D., Wewela—General merchandise store of R. L. Kenaston was burned; loss \$4,000.

Wash., Raymond—Fire damaged the second hand store of Kuhn & Cooper, \$1,500.

Wash., Seattle—Plans have been prepared in the engineering department of the Oregon-Washington Railway & Navigation Co., for a 2-story reinforced concrete warehouse and shop, to be erected by the Western Hardware & Metal Co., at Utah and Connecticut st.; cost \$100,000.

Wis., Antigo—Fire destroyed the hardware store of Laughlin & Kelly Co.; loss \$30,000.

Wis., Black River Falls—Work on F. B. Dell's new building is being rushed; M. J. Scheider has contract; side walls are of blocks and brick; front and interior walls, brick.

Wis., Eagle River—F. J. Thrum will erect a modern cement block 2-story business block.

Wis., Eau Claire—The plant of the Miller Manufacturing Co. was burned, loss \$175,000.

Wis., Elkhorn—Plans for the new building to be occupied by the Whitewater Commercial & Savings Bank have been approved, 28x58.

Wis., Ladysmith—Louis Matola will build a business building, 30x40.

Wis., Madison—Permit was taken out by the Menges Pharmacy Co. for erection of a building; cost \$20,000.

Wis., Madison—Otto Biederstadt has purchased site and plans to build a new business block, to cost from \$200,000 to \$250,000.

Wis., Mansfield—Work has started on the building of a concrete foundation for warehouse of the Connor Retail Lumber Co.

Wis., Montello—R. J. Jaster and crew are building a foundation for new building, 22x49, 2-story.

Wis., Oconomowoc—A new building will be erected by Andrew Jackson soon, 48x100; concrete foundation, Philadelphia tile walls, contract let to the West End Co., and Schroeder & Timmel.

Wis., Osceola—A. F. Solomonson is having an ice house and store room erected by the Lisdom Bros.

Wis., Portage—Fire damaged the E. W. Porter's grocery store \$4,500; the Lommis General Furnishing Store \$8,000.

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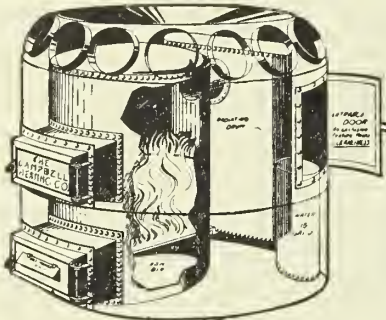
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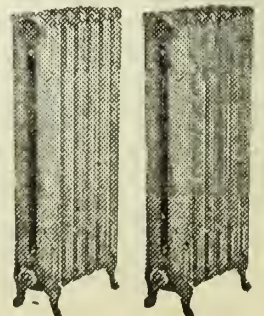
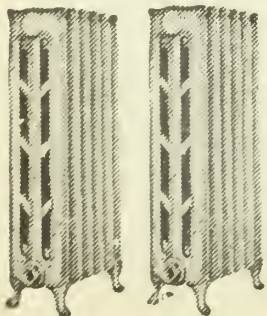
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Wis., Portage—Otto J. Biedderstedt is planning to build an office building; cost \$100,000.

Wis., Portage—Fire damaged the E. W. Porter's grocery and hardware store, \$4,500; the Loomis & Co. general furnishing store, \$8,000.

Wis., Portage—Otto J. Biedderstedt is planning to build a new business building; cost \$100,000.

Wis., Superior—Robert Stewart has let contract for remodeling of the north part of his block.

Wis., Superior—Permit was issued to Loney & Peckham for remodeling the old Citizens building as an undertaking parlor for Joseph Nicol.

Wis., Two Rivers—Fred Schnorr is contemplating erection of a business block soon.

Wis., Washington—Fire destroyed the 5 and 10 cent store and other buildings adjoining, loss about \$250,000.

Wis., Waukesha—The rough plans for the Pewaukee State Bank have been approved; architects, Charlton & Kuenzli are working on detailed plans and specifications; building will be 40x40, 2-story.

Wis., West Salem—The N. W. Railway Co. will build a new warehouse.

Wyo., Cheyenne—Eight buildings were destroyed by fire, including the town hall, at Superior, a mining camp; damage estimated at \$100,000.

CONTRACTS AWARDED.

Minn., Stillwater—Frank Aiple, St. Paul, will erect a brick business building, 40x41, 1-story, with basement, matt faced brick walls, plate glass front; contract let to O. H. Olsen.

Neb., Deshler—H. J. Struve has let contract for new brick building, 66x25, to Fred Kreimeyer, work to start at once.

Neb., Norfolk—Contract awarded to W. E. Orr of Winner, S. D. for erection of the Scott building.

N. D., Dickinson—Contract let to Noggle Bros. for erection of a cement building to be occupied by postoffice.

ELEVATORS

Notes Arranged Alphabetically by States.

Idaho, Twin Falls—City contemplates constructing water works and supplying a number of surrounding villages, estimated cost \$750,000.

Iowa, Shenandoah—City will discontinue pumping water with electricity and use steam; council ordered electric company to remove pumps and to pay back to city amount collected above price agreed upon.

Minn., Glencoe—John Keehn and brother are erecting a grain warehouse in Rasson, N. D.

Minn., Little Falls—City attorney has been instructed to prepare resolution extending water mains on west side.

Minn., New York Mills—This village will install water works in the spring.

Minn., Rochester—Contract let to Matt Holland, Cannon Falls, to dig an artesian well.

Mont., Great Falls—Water mains may be extended to the Aultman-Taylor plant in the spring.

Neb., Homer—Dakota City has started a movement for water works and electric lights; Judge R. E. Evans is of the opinion that a special election will be held to vote bonds for same.

Neb., Long Pine—Election Jan. 20 to vote on erecting a tank or reservoir to be used in connection with the present water system; estimated cost \$5,000; Thos. S. Heck, village clerk.

Neb., Valley City—Question will be discussed by the farmers of Barnes county on proposition of a terminal grain elevator.

Neb., Walthill—Work has been begun on water main extensions.

N. D., Alexander—Business men have organized and will build a 35,000-bushel elevator.

N. D., Arnegard—A 30,000-bushel elevator will be erected here at once; J. M. Burns, grain buyer.

N. D., Cando—Proposition of establishing a potato warehouse in this place is being agitated.

N. D., Jamestown—The Star Elevator Co. will erect a 40,000-bushel elevator west of Stanton.

N. D., Sheldon—Proposition is being discussed for erection of a potato warehouse; a special meeting will be held latter part of January.

N. D., Stanton—An elevator and iron-clad power house will be erected by the Occident Elevator Co., of Minneapolis; capacity 40,000 bushels.

N. D., Valley City—Farmers Elevator Co. incorporated, will build new elevator at Brera; companies formed at Lanona and Cuba will build elevators.

Ont., Ottawa—Plans have been accepted for the large government owned elevator at Port Nelson; plans prepared by

the Canadian Stewart Co., of Montreal; thoroughly modern throughout; work to start in spring.

Sask., Battleford—A by-law passed to provide for borrowing \$50,000 upon debentures to pay for completing the system of water works and sewer system and extending same.

Wash., Spokane—Plans were discussed and the necessity of adding an elevator to the terminal facilities for bulk grain at the coast by state and county officers of the Washington & Idaho Farmers' union.

Wis., Kaukauna—The Kaukauna Farmers' Elevator & Produce Co., let contract for a large elevator.

MISCELLANEOUS

Notes Arranged Alphabetically by States.

B. C., Vancouver—Official announcement received here indicates the Dominion government has decided to purchase at Esquimalt, Vancouver Island, a site for government dry dock accommodation for the largest ocean liners as well as for dreadnoughts. Plans are already in preparation for the work, which will cost \$4,000,000.

Iowa, Muscatine—R. L. Kurowski, representing the John C. Moring Co., Greenhouse Construction plant of Chicago, has been in the city consulting with E. H. Montgomery on the erection of new greenhouses. The two new buildings which will replace the five old ones will be of steel and concrete and contain 1,000 feet more glass than the present ones. A modern heating plant will also be installed; construction will begin in the spring; cement work by a local firm.

Minn., Chisholm—Bids received by city clerk until Jan. 14 for a service building in connection with the greenhouse, to cost approximately \$1,500; stone construction.

Minn., Chisholm—Contract to Adam Schirmer, city, for building municipal greenhouse, at \$1,492; other bidders were A. C. Schirmer & Co., also a local firm, bid \$1,545 on the contract and John C. Moninger Co., of Chicago bid \$2,402.85.

Wis., Grand Rapids—Messrs. Jacobson & Ackerman have closed another contract with the Rock Light & Power Co., of Sterling, Ill., for 600 cubic yards of rock excavation for their new tail race in Rock river just below the U. S. government dam. It will require a coffer dam 700 feet long to do this work. The contract calls for the completion of this work by Mar. 15, 1914.

Wis., Madison—First application for permission to build a power dam under a new law enacted by the last legislature came from C. M. Arnquist, J. M. Arnquist and Kate Tholin of Wausau; they propose to build a 400-foot dam in the Apple river near St. Prairie, St. Croix county, and to erect a plant for generating electric current.

NEW FIRMS INCORPORATED

Notes Arranged Alphabetically by States.

Minn., Duluth—Traprock Land Co., capital \$100,000; Edw. J. Maney and others.

Minn., Duluth—Hunters' Park Land Co., M. Smythe, G. Harris and others, capital \$50,000.

Wis., Milwaukee—H. Barklow Co., capital \$40,000.

Wis., Racine—Friedman's Cloak Co., capital \$75,000, Arthur Friedman and M. E. Walker.

Wis., Milwaukee—Security Mercantile Co., Louis Lco, M. J. Lippert and others, capital \$5,000.

Wis., Superior—Cuba Liquor Co. capital \$1,200; H. W. Dietrich and Helmer Forsland.

Minn., Rochester—Rochester Land Co., capital \$75,000; A. H. Logan, John W. Peck and others.

Minn., Deer River—Deer River Manufacturing Co., manufacturing boxes, lumber crates, etc.; Fred M. Scofield, capital \$60,000.

Iowa, Waterloo—Runyon Perpetual Advertising Co., capital \$10,000; A. L. Runyon, president.

Man., Winnipeg—Winnipeg Glass Co., Emil H. Steiger, Oshkosh, Wis., T. W. Jerems, St. Paul, they will carry on a manufacturing business.

Minn., Baudette—Baudette Realty & Improvement Co., J. W. Collins and others.

Minn., Duluth—Davis Mining Co., capital \$50,000; Alex Hamfield, president.

Minn., Ely—The Miller Store Co., incorporated, with a capital of \$25,000; Frank Crassweller.

Minn., Faribault—Home Investment Co., capital \$60,000; John A. Fasen, president.

Minn., Fergus Falls—Field & Hanson Mercantile Co., S. M. Field, Moorhead, president.

Minn., Minneapolis—Twin City Feeder Manufacturing Co.,

Gilt Edge BoilersHot Water
and Steam
Round and Sectional.**Prudential Smokeless**Hot Water and Steam
Down Draft SystemRadiator and Radiator Valves, Hoffman
Automobile Gas Heaters, The Peerless
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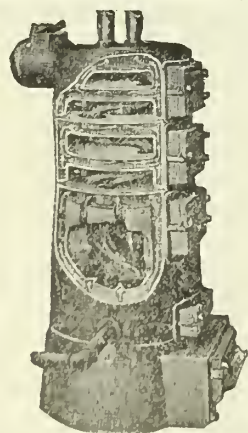
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incorporated, A. J. Peterson, Hall Jacob Peterson and others.
Minn., Minneapolis—Richards-French Co., lumber and building material; capital \$100,000; J. M. Richards, Bemidji, D. N. Winton, Minneapolis and others.

Minn., Rochester—Rochester Land Co., capital \$100,000; C. H. Logan, Geo. B. Storey and others.

Minn., St. Paul—Northwestern Frog & Switch Co., to manufacture machinery, railroad supplies, etc., capital \$25,000; A. W. Arnquist, New Richmond, Wis., president.

Mont., Three Forks—Three Forks Loan & Realty Co., capital \$25,000; P. M. Abbott.

N. D., Grand Forks—Grand Forks Clothing Manufacturing Co., capital \$25,000; Henry Odza and others.

N. D., Grand Forks—The Home Tea Co., H. G. Harvey and others; capital \$25,000.

N. D., Lamoure—The Lloyd Mortgage Co., David Lloyd, president, Paul Adams, secretary.

N. D., Rawson—Farmers' Co-operative Elevator Co., capital \$15,000; L. P. Clark, president.

S. D., Dallas—Townsend Construction Co., capital \$10,000; L. E. Townsend and others, all of Dallas.

S. D., Pierre—Pierre Oil & Gas Well Co., capital \$1,000,000; A. W. Ewert, B. A. Cummins and others.

Wash., Seattle—Monarch Engineering Co., capital \$5,000.
Wis., Appleton—Quinton Oil & Gas Co., capital \$8,000; Henry Schafe.

Wis., Milwaukee—The Schumacher-Seaman Shoe Co., Wm. H. Seaman and others.

Wis., Milwaukee—Milwaukee Knitting Co., capital \$10,000; Meyer Cohen and others.

Wis., Stevens Point—The Arpin Hardwood Lumber Co., increased capital to \$600,000.

RAILROADS

Notes Arranged Alphabetically by States.

Alta., Edmonton—The Grand Trunk Ry. may erect a new station here, located on Dougall Hill.

B. C., Smithers—G. T. P. will begin soon, construction of roundhouses, shops and yards here.

Iowa, Clinton—Modern new station will be built for N. W. road here, following construction of new shops.

Minn., Balaton—Fire destroyed the C. N. W. depot.

Minn., Ballaton—C. & N. W. depot destroyed by fire.

Minn., Brainerd—N. P. has signed contract, according to report, for an extension from Cuyuna-Mille Lacs mine to Duluth-Brainerd mine, to be completed April 30, 1914.

Minn., Duluth—The Chicago, Milwaukee & St. Paul Ry. have made application to the Wisconsin state railway commission, for authority to issue \$30,000,000 bonds for improvements in its system.

Minn., Duluth—D. M. & N. will start work soon on subway at Highland st., cost \$12,000.

Minn., Faribault—Wm. Morris & Son of this city got contract for driving 5,000 piles near Brainerd, across Deer river for the N. P. road.

Minn., Grand Marais—Work started on Grand Marais & N. W. road by James A. Kirkwood Jr., of the engineering staff; clearing of right-of-way begun; President Mitchell will be in charge at the first of the year.

Minn., Le Sueur—Report states Omaha will double track from St. Paul to Mankato, 1914.

Minn., Little Falls—Town of Bell Prairie voted \$5,000 bonds on right-of-way for north and south railway, proposed line from Winnipeg to Twin Cities.

Minn., Mankato—Contract awarded to Widell & Co., this city for track depression, 15th to 21st st., Tacoma, Wash., at \$65,000; 11,000 yards concrete and 80,000 feet tiling to be completed in July.

Minn., Minneapolis—City Engineer Cappelen has started general plans for proposed municipal Union station.

Minn., Sandborn—N. W. may extend Vesta branch soon into the Red River valley.

Mont., Butte—Work will begin early in spring on the Chicago, Milwaukee & St. Paul railway station; fireproof, reinforced concrete construction and pressed brick, 1½-story, modern throughout.

Mont., Butte—Soo directors authorized extension of Flaxton line 66 miles, to a point in Valley county township 26, range 40, E.; president of Soo authorized to secure right-of-way and station grounds; also to make all necessary contracts.

Mont., Fort Benton—The Soo Line will be extended 66 miles further west, according to a copy of resolutions filed with Secretary of State Alderson.

Mont., Great Falls—Montana Western according to report will be part of Great Northern system and be extended to Browning, Mont.

THEATRES AND HALLS

Notes Arranged Alphabetically by States.

Ariz., Tempe—Grand lodge of Odd Fellows of Arizona will build home for old members here at estimated cost of \$150,000; Andrew Nielsen, director, Tempe.

Colo., La Junta—Bids have been opened for the U. S. post-office here as follows: The building is 2-story and basement, with a ground area of approximately 5,240 square feet, stone, stucco and terra cotta facing; tile roof, first floor only of fireproof construction. (a) limestone, (b) sandstone: J. H. Wiese, Omaha, Neb., (a) \$78,895; Frank Kirchoff Lumber Co., Denver, (a) \$85,779, (b) \$85,479; F. H. Lowell, Denver, (b) \$88,410.

Idaho, Priest River—Work started on the foundation of the \$5,000 club building which the local lodge of Odd Fellows will build; 50x60, 2-story, brick; upper story for lodge purposes.

Iowa, Alden—Wetheral & Gage, architects, Des Moines, Iowa, are preparing plans a library building; 28x54, 1-story and basement, cost \$9,000; stone and brick, tile fireproofing, furnace heat, electricity, tile roof and floor; H. E. Button, city clerk.

Iowa, Cresco—Funds for the proposed opera house, which are being looked after by the Commercial club, are nearly all raised; shareholders will soon meet to incorporate.

Iowa, Davenport—A 1-story moving picture theater building will be built by Wm. Thoede; brick, \$4,000.

Iowa, Des Moines—Building committee of the consistory of the Scottish Rites Masons is planning for the proposed cathedral at 14th and High sts., to cost \$300,000; an architect from Topeka, Kan., is to confer with the committee.

Iowa, Shelton—Construction of a city jail is under consideration; address city clerk.

Minn., Anoka—The superstructure of the dormitory to be built by the Ladies' G. A. R. home board, Mrs. J. H. Mullen, president, will be constructed in the spring; F. L. Marsh, architects, Champlin, Minn.; hollow tile, 29x43, stucco finish outside and plaster inside direct on tile; 2-story with wood roof, connected to present hospital building by sun-parlor, 12x20, of wood construction, has 14 bed rooms, closets and 2 bath rooms, basement under half of building, city water supply vacuum vapor heat; also supplying warm, fresh air, to each room through separate pipes for ventilation, the foul air being carried off by double flue chimney; drainage to septic tank; basement not complete.

Minn., Hibbing—Proposition on foot for a 5th theater, vaudeville and moving pictures; to have seating capacity of 400.

Minn., McIntosh—Simon Solberg is rapidly getting his building into shape for motion pictures; 24x95, seating capacity 300; up-stairs will be used for a hall for public use.

Minn., Thief River Falls—The Commercial club has decided to build a modern 4-story business building in the center of the business district. Plans are for a structure, 100x140 feet; first floor to be for store purposes; second, for offices; and third and fourth, for club and lodge rooms. Approximate cost of the building will be \$100,000. A stock company will be formed on Jan. 9, for the purpose of promoting the project.

Mo., Columbia—Fraternity buildings are to be built here as follows in connection with the University of Missouri: Phi Delta Theta fraternity, a 3-story brick building, on College and Keiser sts., to cost \$17,000; Sigma Nu., a 3-story brick building at Hitt and University avs., cost \$20,000; and Delta Tau Delta, a \$20,000 chapter house.

RESIDENCES

Notes Arranged Alphabetically by States.

Iowa, Boone—Fire damaged the home of Mrs. H. M. Pensborn.

Iowa, Davenport—Permits were issued to Coen & Conway for erection of a 2-story frame residence for F. A. Quinn, \$3,500; to P. C. Carstensen, for a 1½-story frame dwelling, Hancock av. and Claussen st., \$1,800.

Minn., Hutchinson—A \$5,000 residence was burned.

Minn., Hasty—Plans prepared by architect, F. L. Marsh, Champlin, Minn., for enlargement of a farm residence of O. B. Olson, plumbing fixtures in bathroom and sink in kitchen, water supply by "fresh from well" system, including well and 200-barrel cistern, gasoline power engine.

Minn., Round Lake—Fire destroyed the residence of E. A. Moose.

Minn., St. Peter—Louis Rice is building a residence, 28x32, modern throughout.



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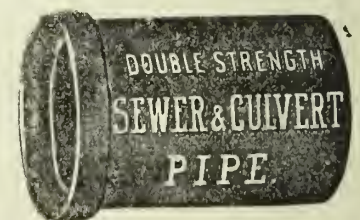
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IF you wish to avoid having any DULL SEASON and that tired feeling that comes from not having enough to do, the remedy is very simple—
A---Proper Publicity. B--Advance Construction News Report.

Iowa, Anamosa—Sam Propst, Sr. will erect a modern house.

Iowa, Arcalia—Henry Terlisner will build a dwelling. **Alta**—Geo. A. Dalziel will build a residence. **F. W. Wadsworth** is contemplating erection of a dwelling. **A. M. Connor** will erect a dwelling. **Albert City**—C. W. Young is contemplating erection of a modern residence in spring. **Clarion**—L. S. Sanders is erecting a modern cottage. **Denison**—Wm. Neettinger has commenced work on a new residence. **Elk Horn**—Fred Larson and John Esbeck will build a modern house. **Herman Hansen**, carpenter. **Ft. Dodge**—Walter Flandson is erecting a dwelling. **Humboldt**—Chas. Mayer has contract to build F. A. Ayer's house. **Iowa Falls**—S. W. Wright is contemplating erection of a new residence. **Manila**—J. M. Miller of Defiance is erecting a residence. **Moorehead**—R. M. Robinson is planning to build a dwelling. **Wessington Springs**—Joe Sheldon is erecting a house.

Iowa, Birmingham—Geo. Fords, 2-story residence burned.

Iowa, Bloomfield—T. T. Tolbert is excavating for the erection of a residence.

Iowa, Burlington—Mrs. Galbraith is erecting a modern apartment house.

Iowa, Carlisle—A new modern residence will be erected by W. D. Kail.

Iowa, Cedar Falls—Fire destroyed the home of T. Messier; loss about \$3,000.

Iowa, Cedar Falls—H. G. Vinall will commence erection of a new residence in place of one burned.

Iowa, Cedar Falls—Fire damaged the residence of F. C. Rammer from \$500 to \$800.

Iowa, Charlotte—John H. Ladehoff, Charlotte, Iowa, prepared plans for a 2-story brick parsonage, for Rev. Thomas O'Dowd, Charlotte, 32x32; cost \$7,000; bids taken by architect, from Feb. 1 to Feb. 20; tile fireproofing, cut stone, common pressed brick, hot water heat, electric lights, wood roof, patent plaster, metal lath, corner bead, plate glass, art and leaded, oak floors, oak and yellow pine finish.

Iowa, Clarion—L. S. Sanders is erecting a modern residence.

Iowa, Clarion—The Congregational church will erect a parsonage, work to begin in spring; cost from \$3,000 to \$3,500.

Iowa, Clarksville—A. G. Tennyson has broke ground for a new dwelling.

Iowa, Davenport—Permit issued by F. W. Friedholdt for erection of a 2-story frame dwelling, for W. J. Orendorff; cost \$4,000; for W. A. Thomsen residence; cost \$2,500.

Iowa, Jacksonville—H. P. Hansen will build a modern residence in the spring.

Iowa, Keokuk—Fire damaged residence of A. F. Marles, \$8,000.

Iowa, Meltonville—D. J. Ramsey and son are building a new house.

Iowa, Muscatine—The residence of Fred Bloomer was burned; loss about \$4,000.

Iowa, Oskaloosa—Mrs. Mary Douglas is constructing a bungalow cottage brick and hollow tile foundation, modern.

Iowa, Williamsburg—Milo Black is building a house.

Man., Hamiota—Fire damaged the home of W. McConnel, about \$5,000.

Minn., Albert Lea—Dr. R. G. Stevenson will build a modern residence.

Minn., Canby—B. Mummy will build a cottage, 28x28, modern, hot water heat, electric lights and power, full basement.

Minn., Crosby—E. E. Hanson contractor is building a bungalow for himself.

Minn., St. James—John Rolf is building a residence.

Minn., Duluth—A 2-story frame residence will be erected by H. A. Wing, 26x28, plans by architect, Austin Terryberry, Duluth, Minn., cost \$3,500; stone foundation, native stone, XX cedar shingle roofing, wood cornice, d. s. glass, hard wall plaster, hot water heat, maple flooring, oak finish, bath rooms, one grate, one mantle, plumbing, storm sash; foundation in.

Minn., Duluth—Fire destroyed the cottage of Joe Rich.

Minn., Elk River—Wm. Brooks is building a modern house.

Minn., Ellendale—The house of Andrew Berg was burned; loss about \$1,000.

Minn., Fairmont—Thomas Brooks of Armstrong is building a modern house.

Minn., Fairmont—J. M. Stewart has plans drawn for a modern house, to be built in spring.

Minn., Fergus Falls—August Palm is building a modern residence.

Minn., Hutchinson—Julius Zipf is building a 2-story residence, 28x30.

Minn., Lewiston—Albert Stenerenagle is planning to build a stone residence in spring.

Minn., Long Prairie—Fire destroyed the home of Mrs. J. Goodman; total loss.

Minn., Mankato—Plans being prepared by architect, Albert Schippel, Mankato, for a residence for Chan. N. Weyer; frame cost \$5,000; hot water heat, electric lights, wood roof, oak finish; bids called for later, taken by architect.

Minn., Mankato—Foundation is in for residence for R. O. Eberhart, 2-story brick, plans by Albert Schippel, architect, Mankato; cost \$5,500; bids received later by architect, hot water heat, or vapor, electric lights, oak finish; to be finished in spring.

Minn., Menahga—Henry Hepokoski is building a modern dwelling.

Minn., Oronoco—Mr. Fisher is remodeling and building addition to his house; Fred Koenig, Sr., is building a house; Mr. Kahler of Rochester is erecting a cottage.

Minn., Parkers Prairie—Henry Judson is erecting a modern house.

Minn., Redwood Falls—Dr. J. W. Inglis will erect a 2-story frame dwelling; cost \$4,000; bids taken later by owner, to be erected in spring; hot water heat, wood or asbestos shingle roof, oak finish; plans in preparation by architect, Albert Schippel, Mankato.

Minn., St. Paul—Fire damaged the rooming house conducted by Mrs. Maggie McClusky, 75 Iglehart, \$400.

Minn., Verndale—I. A. Shaw is enlarging his house.

Minn., Waconia—Postmaster Kuntz plans to build a modern residence next spring.

Minn., Warren—Mat Rivard of Fork contemplates erection of a residence.

Minn., Winona—Fire damaged the home of Mrs. Victoria Kiuzik, \$100.

Minn., Young America—A. F. Schwartzkopf will build a residence next spring.

Minn., Zumbrota—Charles Eastman is building a modern residence.

Mont., Big Timber—Carl D. Paulson has begun erection of a 5-room cottage, modern throughout.

Mont., Billings—W. E. Piper of the Piper Construction Co. is building a modern residence.

Mont., Butte—Fire destroyed the interior of the J. J. Nicholson home; loss estimated at about \$15,000.

Mont., Clyde Park—A new modern house is being constructed for Homer Tregloan.

Mont., Cut Bank—Henry Hagan is erecting a 50-room cottage.

Mont., Great Falls—Mrs. Burt Colvin received permit to construct a dwelling at 3508 4th av. N., cost \$260; permit issued to L. B. Larson, to remodel dwelling at 1709 2d av. N., cost \$750.

Mont., Great Falls—Permit issued to Bernard Joyce for four 1-story frame bungalows; cost \$1,000 each.

Mont., Missoula—Fire destroyed the residence of Harry A. West; loss \$1,500.

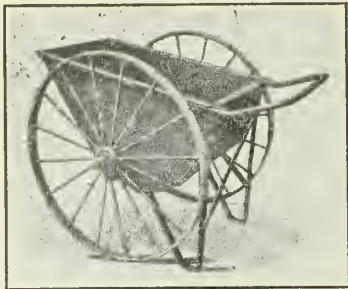
Neb., Blair—S. W. Chambers plans to build a modern residence in the spring. **Columbus**—Ira Elliott has commenced erection of a modern residence. **Deshler**—Dr. F. B. Hensel will erect a house, modern. **Inman**—Geo. Coleman is erecting a 2-story modern residence. **Lewellen**—Benno Tilgner is erecting a cottage. **Loup City**—Work has begun on the bungalow for John Olson. **O'Neill**—Stewart Hardigan is building a new modern house.

Neb., Fairbury—Williams & Harlan are constructing a dwelling for Herbert Shearon, 28x38, bungalow style. **Homer**—John Allan of Winnebago is building a 2-story residence, 26x26. **Lincoln**—Permit issued to Geo. Huck for a dwelling, \$1,000. **Norfolk**—Work has started on new house for Mr. Coleman, Geo. Davis is also building. **Cleairo Allen** is contemplating erection of a house. **Wilber**—Stanley Bates will build a new house.

Neb., Gordon—E. A. Waterman will so erect a modern residence.

Neb., O'Neill—George Coleman is erecting a modern 2-story residence. **Oshkosh**—Benno Tilgner is building a cottage, 18x26. **Chris Fisher, Jr.**, contractor. **Lewellen**—Alfred Brautze is building a cottage. **Loup City**—Frame work of John Olson's cottage is up. **O'Neill**—Stewart Hardigan is building a modern house. **Deshler**—D. F. B. Hensel is building a modern dwelling. **Columbus**—Ira Elliott has commenced erection of a modern residence. **Blair**—S. W. Chambers will build a modern house in the spring.

CONTRACTORS' NECESSITIES

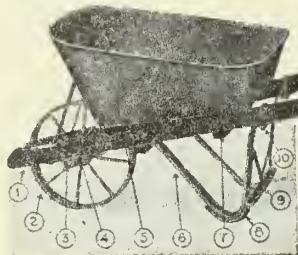


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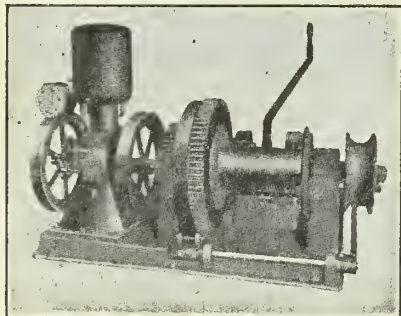
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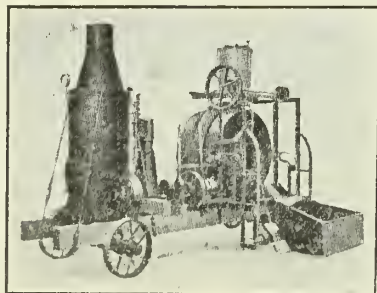
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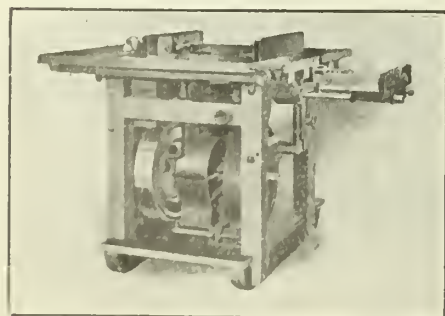
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*Neb., Plainview—Nels Christianson is building a modern residence. Oshkosh—W. J. McIntosh is building a 2-story frame house, 14x38. Osceola—Geo. Beebe is building a new house, 2-story, modern throughout. Norfolk—R. Fishback will build. David City—Kaveney Bros. will erect a large residence. Oshkosh—Tom Farrens will start work on Howard Meekess' residence soon. Fairmont—W. W. Prescott is drawing plans for an 8-room bungalow for Dr. J. M. Carr. Creighton—John Greene is erecting a modern house. Wilber—Stanley Bates is building a residence.

*Neb., Raymond—L. A. Simmons is building a residence. Norfolk—Lester Parker is constructing a 5-room bungalow. Kearney—Work has started on a bungalow for Ray Turner. Greenwood—Ross Nichols is erecting a house. Fremont—W. G. Luhrs is building a dwelling, 2-story, modern. Tobias—Carpenters commenced work on the M. E. parsonage, John Anderson, carpenter. Silver Creek—H. J. Graves will build another house.

Neb., Ruskin—I. C. Hansen will build a new cottage.

Neb., Ruskin—Dave Shafer is building a neat addition to his residence.

Neb., Tekamah—Don. F. Bramhall will build a residence in spring; cost \$3,500, pressed brick.

Neb., Wilber—Stanley Bartos is building a residence. Tekamah—Don. F. Bramhall will erect a modern residence of pressed brick, cost \$3,500. Omaha—Leonard W. Scheibel is building a modern dwelling. Norfolk—E. E. Coleman is building a modern residence at 1211 Norfolk. Norfolk—Geo. Davis is building a new house, modern. Fairbury—Williams & Harlan are constructing a new house for Herbert Shearon, 28x38, bungalow style, basement finished for garage.

N. D., Beach—U. U. Martin is building a modern residence.

N. D., Beach—The home of A. H. Balckbourn was burned; O. C. Hougan, residence burned; loss \$1,200.

N. D., Bentley—Fire destroyed the home of Andreas Kallis.

N. D., Center—Work started on the new parsonage.

N. D., Center—Work has begun on residence for A. C. Dresser, M. Jennings and crew carpenters.

N. D., Jamestown—Fire destroyed the residence of John Gross.

N. D., Mott—Foundation for the new M. E. parsonage is completed and construction work will begin at once.

N. D., Mott—The home of Andreas Kallis was burned.

Omaha, Neb.—Permits were issued to L. W. Scheibel for a dwelling; Carl F. Nelson dwelling, \$2,300; C. E. Williams Co., dwelling, \$3,000.

S. D., Belle Fourche—J. M. Mishler is erecting a modern large house.

S. D., Deadwood—Fire burned the residence of Janjichm the grocer; loss about \$2,000.

S. D., Redfield—Fire destroyed the home of Rev. C. H. Driesbach.

Wash., Clarkston—Herman G. Chase has begun erection of a new house; modern throughout; cost about \$2,500.

Wash., Seattle—Geo. D. Dunn, received permit for erection of a modern bungalow, plans drawn by architect D. D. A. Outcalt. Bankers Trust building; cost about \$2,500; contract let to V. D. Crane, 1119 S. 60th st., construction to begin at once; fireplace, sleeping porches, modern; plans for residence for William Ables are being prepared by Architect Outcalt.

Iowa, Sioux City—Fire caused \$400 loss to home of Wm. McDonald.

Wis., Glenwood—John S. Teigen is building a residence, 24 x26, 2-story cement basement, modern.

Wis., Green Bay—Jules Gutzman is building a dwelling.

Wis., Milwaukee—Permit issued to Chas. Frey for erection of two brick flats, Downer and Concord av., cost \$9,000 each; building operations to begin in spring; R. J. Wussow, 519 35th st. has taken out permit for erection of a 2-story flat building, frame, at 35th and Cherry st., cost \$4,900; also for two veneer flat buildings on same corner, costing each \$5,200; work to commence in spring; carpenter, L. Winfisch, mason contract to Wm. Dahlman, masonry and building company.

Wis., Milwaukee—Erection of a new German Catholic parish building is being contemplated. A site has been donated by Geo. A. Carroll.

Wis., Mondovio—T. R. Litchfield is building a modern cottage.

Wis., Oconomowoc—Harry Jacobs is erecting a residence.

Wis., Ostburg—John J. Theune will build a modern residence.

Wis., Sheboygan—District attorney, W. B. Collins is building a modern residence; cost \$5,000.

Wis., Stone Lake—E. E. Reynold's is erecting a modern cottage.

Wis., Sturgeon Bay—Foundation is in for Aug. Brann's new residence.

Wis., Superior—Permit was issued to K. Jameson for a frame dwelling; cost \$1,800.

Wis., West Salem—Will Arndt will build a modern house next summer.

MUNICIPAL IMPROVEMENTS

CALGARY CONSIDERS ABATTOIR.

One unit of the proposed abattoir to be built by Calgary will be erected first probably, and it will cost in the neighborhood of \$125,000. This may be large enough to serve for ten years or so, after which further units may be constructed. In time the city's abattoir may represent an investment of \$500,000, or the same amount being expended by P. Burns & Co. in their new plant. The matter was discussed at a meeting held in Mayor Sinnott's office, attended by the mayor, Alderman Tregillus, chairman of the city stockyards committee; Alderman Garden and William R. Perrin, the city's abattoir expert and architect, and it was agreed that the unit system should be adopted and that it would be necessary to build a first unit costing \$125,000. This sum will be the outside limit for the first expenditure. It is possible that it may in reality cost less. However, the information as to the needed capacity will govern this phase of the question. Mr. Perrin went east immediately, and will commence to prepare plans for the abattoir building upon the receipt of information from the Retail Merchants' Association as to the probable demand for accommodation, which information will be obtained by J. A. Bucknall, secretary, and upon receipt of information as to the plans of the three railroads. Mr. Perrin will plan out the layout of the stockyards as a whole.

REGINA FAVORS CITY ABATTOIR.

The Regina Retail Merchants' Association will petition the city council to establish a municipal abattoir. The matter was brought up at a meeting of the association last evening, by the butchers' section, who asked that they be given the support of the association, as they deemed it necessary for the protection of themselves as well as the citizens of the city. As a result of the discussion the following resolution was passed unanimously: "That the Retail Merchants' Association of Regina is in favor of the establishment of a municipal abattoir for the protection of the retail butchers as well as the citizens of this city, and that a copy of this resolution be forwarded to the city council."

GRAND FORKS ABATTOIR.

Several Grand Forks butchers are considering the renting of the municipal abattoir and bids will be submitted to the city council at the next meeting. Some of them have been consulting with City Attorney Wineman as to what steps they should take in the matter of securing a lease on the plant, and what limitations will be placed on them, should they rent the equipment.

RECENT LEGAL DECISIONS

STREET IMPROVEMENT—CONTRACTOR'S DEFAULT—CITY'S LIABILITY.

Burnham vs. City of Milwaukee.—Where a city in the exercise of its public powers contracted for a change in the grade of a street and the construction of an approach to a bridge, it was not liable for injuries to an abutting owner due to the fault of the contractors in incumbering the street with tools, men, engines, sheds, wagons, and appliances for a long time after the date fixed by the contract for the completion of the work had expired, impairing or preventing access to plaintiff's premises, etc.; the plaintiff's cause of action being solely against the contractors. Failure of a city to enforce penalty clauses in contracts for public work does not give rise to a cause of action in favor of an adjoining property owner against the city.—Supreme Court of Wisconsin, 143 N. W. R. 1067.

PLANS AT BUILDERS' EXCHANGE MINNEAPOLIS.

Plans on file Dec. 29, 1913, at the Builders' Exchange, Minneapolis: Elevator, Golden Valley, N. D., bids opened Dec. 27; high school, Montevideo, Minn., bids opened Dec. 29; State Sanatorium buildings, Walker, Minn., Jan. 2; mechanical equipment buildings, Walker, Minn., bids opened Jan. 2; court house, Plandreau, S. D., Jan. 6; bank building Long Prairie, Minn., bids opened Jan. 12; club house, Livingston, Mont., no date set; bids in for school, Foley, Minn., mechanical equipment school, Foley, Minn.; produce house, Swift & Co., Creston, Iowa; postoffice, Mandan, N. D.

Contracts awarded: addition, Soldiers' Home, laundry, Minneapolis, Algot F. Johnson, Minneapolis; Sacred Heart academy, Fargo, N. D., Polson Bros., Chicago; electric construction, power plant, Rochester, Minn., Minneapolis Electric Equipment Co.; piping, state hospital, Rochester, Minn., Healey Plumbing & Heating Co.; fire escapes Rugby, N. D., bids rejected.

CONCRETE MIXERS

The mixers described and illustrated here are in almost every case the latest models as they will be manufactured and sold in 1914. It has been impossible for The Improvement Bulletin to put to actual test the claims made for every mixer. For our information about each mixer we have gone straight to the man who knows most about it, namely, its maker. Practically all statements made can be backed up with letters from users. Prices on all mixers can be secured direct from the manufacturers at the addresses given. The manufacturers of the mixers described will be taken up in alphabetical order, according to the name of the company.

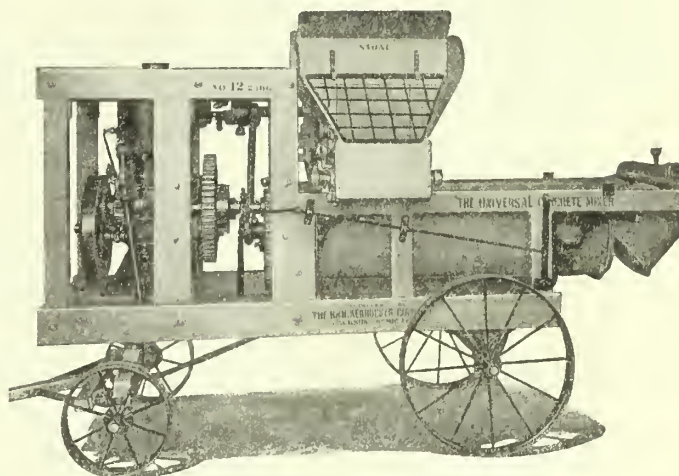
NAME—COLTRIN CONCRETE MIXER.

MANUFACTURED BY—THE KNICKERBOCKER CO.

ADDRESS—JACKSON, MICH.

LOCAL AGENT—NELS ERICKSON, 406 Boston Block, Minneapolis, Minn.

The No. 12 Coltrin is a continuous-batch mixer, being a combination of the batch principle of mixing with an automatic continuous feeder. The mixing is accomplished by means of a cylinder composed of seven blades of high carbon steel, which revolving within a large stationary shell give the same cutting through, lifting, turning and pouring that characterizes the batch principle of mixing. The automatic feeder has three hoppers for stone, sand and cement and can be regulated so as to give any desired proportion. It has a positive forced feed and may be relied upon to accurately proportion materials.



The Coltrin Mixer.

Several hundred of the No. 9 Coltrin Mixers are in use in Minnesota and the two Dakotas. No. 9 is similar to the No. 12 with the exception of the feeder, having a roll trip feed by which the cement is proportioned and delivered into the mixing shell every time a plate is tripped with a shovelful of sand or gravel.

NAME—KOEHRING 3-IN-1 MIXER.

MANUFACTURED BY—KOEHRING MACHINE CO.

ADDRESS—MILWAUKEE, WIS.

LOCAL AGENT—H. B. JONES, 350 Security Bank, Minneapolis, Minn.

The Koehring drum is cylindrical in form, with heavy, slightly rounded, cast heads.

Near the longitudinal center of the interior periphery of the drum is an annular row of low, flat buckets, alternating with long, slightly rounded, diagonal mixing blades, which are arranged to carry the material alternately to each end of the drum, and the inner end of the discharge chute, when in mixing position, extends a considerable distance into the drum and slopes downward.

In mixing, by the rotation of the drum, the buckets cut through the contained material at the bottom and carry portions of it up and pour it from the side. The mixing blades also cut through at the bottom, and carry material up and discharge it alternately from end to end, breaking it over against the heavy heads of the drum. Material carried to sufficient height by both buckets and blades, falls on the in-

(Continued on page 47.)

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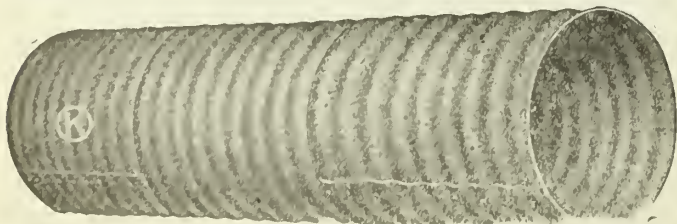
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NEW DEVELOPMENTS IN TRANSMISSION LINE PRACTICE AND EQUIPMENT.

(Continued from page 13.)

December, an insulator that did not puncture at 250,000 volts on 60 cycles, when immersed in oil, failed in this way when subjected to a high-frequency voltage not much greater than 100,000 volts, and it was generally noted that insulators that would flash over on 60 cycles would puncture on high-frequency. The tests just mentioned were confined to pin-type insulators. Based upon the results of this test, and upon corroborative evidence obtained in low frequency investigations, the trend of the electrical design seems to be toward the production of insulators in which the point of flash over as compared with the puncture strength, is considerably lower than has been the case formerly. In pin-type insulators this has resulted in an increase in the total thickness of dielectric at the head, and the use of somewhat thicker and less flaring inner shells. In suspension-type units the result has been to shorten up the string length. In both cases arcing contacts are being provided to prevent damage from a flash-over, and the use of a flash-over suppressor is expected to assist in coping with such breakdowns when they do occur.

Another weakness in insulator design that has been detected is a mechanical one noted in suspension units. This is the internal strain growing out of the difference in the temperature co-effects of expansion of steel and porcelain. Strains are set up in the porcelain in this way that are heavy enough to cause failure when the external load is fairly heavy. This is a weakness that has generally been more noticeable in the case of strain units, but it has also shown up where suspension insulators carried heavy conductors in long spans.

As to the relative use of the two types of insulators, the pin-type is still in high favor for lines up to 60,000 volts, in fact, one very well known syndicate will use nothing but the pin-type for any of their work, I am told. As the matter stands, suspension insulators must, of course be used for the ultra-high pressures and they are often used for pressures as low as 33,000 volts, though it must be said that there are many cases where it would appear that the pin-type would work out better and more economically.

Fittings, such as suspension insulator clamps, have been given a little attention of late. When the suspension insulator was first introduced, little attention was given to this detail, and even up to the last year or two wire clamps with a small clamping area and sharp edges have been used. This resulted often in a cutting action on the conductor, and somewhat in a crystallization of the material as well, so that many failures were noted that were traced to these causes. New designs of conductor clamps, with greater bearing areas and with an easy relieved entrance curve have remedied these faults to a great extent.

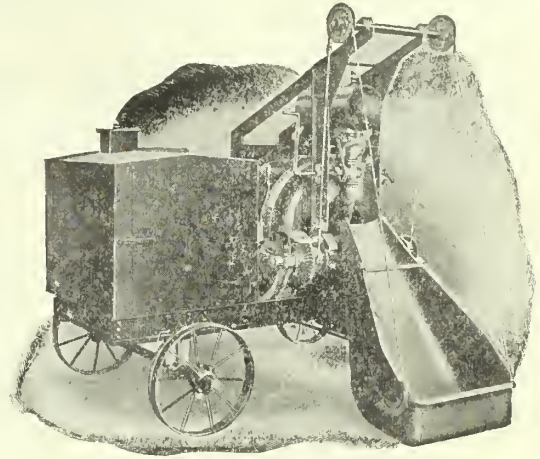
Within the past year or so, conductor breakage in the conductor span, as distinguished from that at the supports, has been a source of worry to the engineers of several well known systems. In cases where the failure has been confined to a certain type of cable, the trouble appears to the speaker to be due to overstraining of the conductors through the use of long spans without adequate sag, combined with a fatigue or crystallization of the material, developed through the knitting together and springing back of the individual strands, as the tension in the cable increased and decreased. The trouble experienced has been confined mostly to hard-drawn copper, and several companies now call for medium hard-drawn conductors on that account. To the speaker, however, it appears that the method of cabling and the stringing of the wire are more at fault than the material.

To increase the strength of conductors, compound cables are being employed, in which the core is of steel with copper or aluminum stranded around it. The conductor that is to be used for the 150,000-volt line of the Pacific Light & Power Corporation may be described as typical. It is made up of a seven-strand steel core with thirty aluminum strands cabled on it, making a conductor that is about 0.95-inch in overall diameter. The use of these compounds, or we may say reinforced, cables has not been very general as yet, and so not much data is available. Where the difference in the characteristics is as great as it is in the case of steel and aluminum, there may be some doubt as to the success of such a combination.

Copper clad wire is being used to a slowly increasing extent. It is being much employed for ground-wire and telephone work in transmission line construction. In a few cases of note, it has been used for the conductors also. There is no question that it can often be used with economy where the conditions are such that the copper wire that is found correct for the electrical conditions imposed is too small to give the mechanical characteristics called for by the span length it is desired to use. Its cost per pound, however, is comparatively high, and it is not economical as often as snap judgment would indicate.

CONCRETE MIXERS --- Continued.

wardly extending discharge chute, and flows off the inner end of the chute in a shower or sheet, the entire width of the chute. This action is precisely the same as a body of water dashing downward over rocks or a cataract flow.

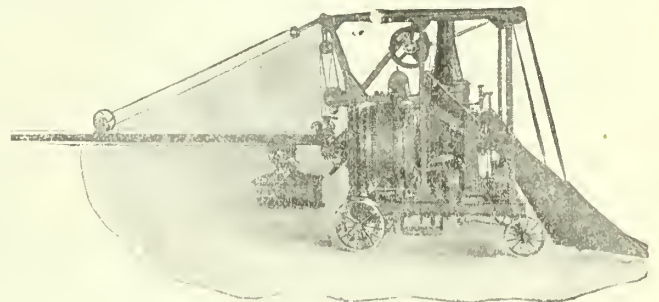


Koehring Mixer Mounted on Trucks with Gasoline Engine, Side Loader and Water Measuring Tank. Charging Side View Showing Mechanism for Operating the Side Loader.

Since these three independent mixing actions are constant and opposed to one another, there is a continual intermingling of all the material in the drum, and practically three times as much mixing, which means practically three times as fast mixing, as would be possible with any of these actions alone.

THE SIDE LOADER.

A feature of the Koehring Mixer that appeals to every discriminating buyer of mixers is the remarkable ease in which material is elevated into the mixing drum. The charging bucket is short, wide and low, which permits us to use a very compact steel hoisting frame entirely self-contained on the mixer without supporting feet and therefore making the machine far more portable than where cumbersome frames with supporting feet are required.



No. 22 Special Street Paving Mixer with Concrete Delivery Boom and Bucket, Showing Open End Loading Bucket.

The Koehring street paving mixer is constructed entirely of steel and iron and is of exceptionally compact and portable form. The frame is made of heavy channel iron and closely riveted making it very rigid.

This machine is equipped with an end loading bucket, holding the full capacity of the drum, a water measuring tank which supplies the proper amount of water for each batch, reversible traction drive and steering arrangement.

This mixer was especially designed for laying concrete footings for streets, but it can be used for any class of work and is well adapted for mixing concrete for bridge abutments. The machine is mounted to discharge at the rear instead of at the side as is done by the standard mixers. It is provided with traction drive for moving it along the streets when laying base, enabling it to be always kept at the exact location for most rapid work with least handling or hauling of material. This enables the supply piles to be made continuous along the sides of the street and the mixer placed in the center between the piles and moved along as condition requires, to always keep it in most convenient position to the supply of material and delivery of concrete.

(Continued on page 49.)

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BUSINESS INFORMATION

In this section will be found information relating to new devices and methods of construction; also mention of late catalogues issued by manufacturers of building materials and equipment.

Any catalog mentioned here can be seen at the office of The Improvement Bulletin, 912 Lumber Exchange, Minneapolis, where a complete file is kept.

O. F. Jordan Co., Chicago, Ills., catalog, 16 pages, illustrated. The Jordan spreader is fully described in the above booklet which shows this great machine in operation leveling banks, removing snow from railroad tracks and conveying material. It is a strongly constructed machine, being made all of steel and having two large side arms or wings which can be folded back when not in use.

Otis Elevator Co., Chicago, Ills., catalog of residence elevators. The story describing the residence elevators manufactured by this company is very interesting and it is put in an attractive form. One is led from the top to the bottom of the residence in which the elevator is installed and its convenience is clearly pointed out. The book is handsomely illustrated and contains a partial list of users with their addresses.

Otis Elevator Co., New York City. Folder about gravity spiral conveyors. A typical arrangement of the Otis gravity spiral conveyor in a department store is shown in this folder and a long list of firms using the conveyor is given. The diagram is especially clear and interesting.

Merritt & Co., Camden, N. J., folder, 16 page folder describing steel office furniture and equipment. The advantages of steel equipment for offices and factories are well pointed out in this little folder, which has pictures of steel desks, files, shelving, lockers, and equipment for offices and factories.

Dahlstrom Metallic Door Co., Jamestown, N. Y., "What Ex-Fire Chief Croker says of the Dahlstrom Products." This little pamphlet contains an interesting speech made by Chief Croker of New York at the International Municipal Congress, in 1911. It shows that he believes fires are not to be put out but to be prevented, and he tells just what kind of buildings will be fireproof. Better write for it.

Dahlstrom Metallic Door Co., Jamestown, N. Y., catalog. "Buildings as They Should Be" are, according to this handsome catalog, constructed of steel or, at least, finished with it. The reason for such construction are very convincingly given, too, and the book being produced by the Frank Presbrey Co., is virtually a work of art. It is full of handsome pictures showing Dahlstrom doors and products in use and giving views of large buildings the country over, in which they have been placed.

McCabe Hanger Manufacturing Co., New York, 32 page catalog, illustrated, about ball bearing door hangers. We have all experienced the pleasure of trying to pull out one of the old fashioned sliding doors, on which the hangers were out of order and can therefor appreciate the good points of the McCabe Hangers. They are ball-bearing, will not get out of order and are made in styles suitable for all uses, from a parlor door to a barn door as shown in the above catalog.

Northwestern Expanded Metal Co., 37 W. Van Buren st., Chicago, Ills., "Expanded Metal Construction," illustrated monthly. The organ of the Northwestern Expanded Metal Co. for January has some more good pictures of first class residence, school and buildings where expanded metal has been used. Under each picture is given the names of the architect and contractors. The magazine will be sent free every month to interested architects and contractors on request.

International Clay Products Bureau, N. Y. Life building, Kansas City, Mo. "How to Build a Safe Chimney" is the title of a folder issued in the interests of brick and tile manufacturers by this bureau. It contains a model chimney and fine ordinance suggested by the National Fire Protection association for towns and villages showing how proper regulation will avoid the possibility of many fires.

MACHINERY TRADE BETTER.

A slightly better feeling prevails in the machinery trade, due to an improvement in general business conditions, says the Milwaukee Correspondent of Iron Age. Hopes for a realization of the prospect of marked improvement immediately after the first of the year are considerably strengthened by the inquiries received the past week or two relating to deferred business that ordinarily would have been placed before now. Curtailment of factory forces is gradually lessening, and production is being fairly well maintained.

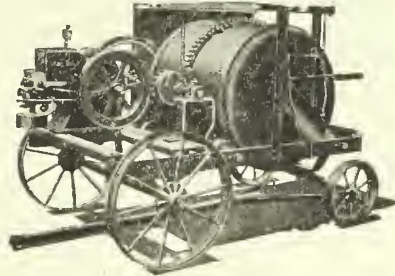
CONCRETE MIXERS --- Continued.

NAME—BRONCHO MIXER.

MANUFACTURED BY—THE LANSING CO.

ADDRESS—LANSING, MICH.

LOCAL AGENT—LANSING CO., 330 1st st. N., Minneapolis, Minn.



The Broncho Mixer.

This is a steel constructed machine, light weight, designed to fill the demand for a hundred and one odd jobs that general contractors have, requiring a light machine, easily moved, with no setting-up, but turning out a good quantity of material per day.

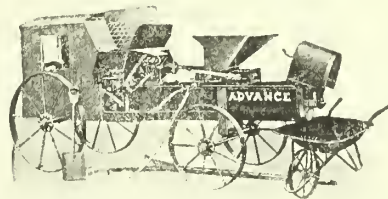
This mixer is low-charging type, which can be loaded directly from the ground, or a small platform erected and loaded with wheelbarrows. It has a quick, clean discharge and will prove exceedingly valuable for sidewalks, curb and gutter, floors, foundations, small bridges, culverts, reinforced buildings, etc. It is sold at an exceedingly low price considering the capacity and the sturdy construction. Being simple in construction, it has few wearing parts and is equipped both with magneto and battery, doing away with are average engine troubles ordinarily experienced on mixers. There is practically nothing to wear out and is therefore a machine of long life. Contractors are doing away with large, heavy mixers and adopting smaller types even for their big jobs, as the saving in setting up and moving is a very considerable sum.

NAME—ADVANCE CONTINUOUS MIXER.

MANUFACTURED BY—THE LANSING CO.

ADDRESS—LANSING, MICH.

LOCAL AGENT—THE LANSING CO., 330 1st st. No., Minneapolis, Minn.



The Advance Continuous is a combination of batch principle with continuous mixing. The mix is effected by sliding boxes which fill on the outward stroke and dump on the inward. This gives accurate proportions at all times and a perfectly uniform mix. Continuous mixers generally secure more mixed concrete from the same number of men than from batch mixers, for the reason that the machine is always hustling the men to keep up. The "ginger-bread" construction found on the average mixed is dispensed with on this type and records are on file where these machines have been in use from four to six years and still in operation. As the average life of a continuous mixer is only two years, it will be noticed that this machine is unusually long lived and well made. Everything, except the housing, is either steel, malleable iron or cast, and special attention is given to detail of construction to avoid defective parts.

A FORTY-STORY SKYSCRAPER.

William A. Newman, the San Francisco architect, states that an eastern syndicate of capitalists has obtained plans from him for a forty-story structure to be erected on a prominent corner on Market st., San Francisco, at a cost of \$1,500,000 for the building.

The building as planned will be the largest and hand-somest office building on the Pacific coast, and one of the finest of its kind in the world. The style is adapted from the French Gothic of the fourteenth century.—Architect and Engineer of California.

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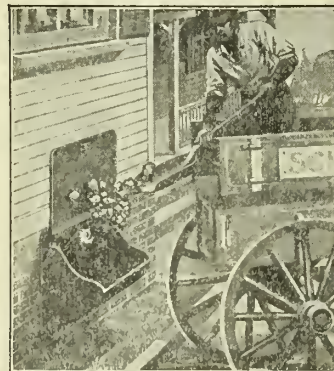
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(Each week in this space will appear a letter from different prominent contractors telling
of experiences with "Carney's Cement" mortar.)

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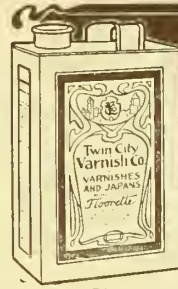
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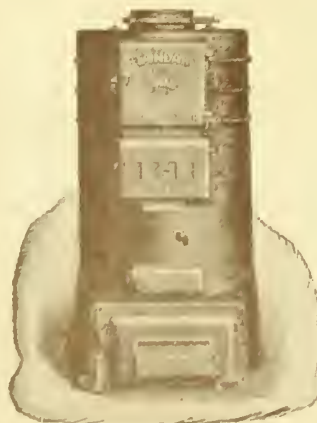
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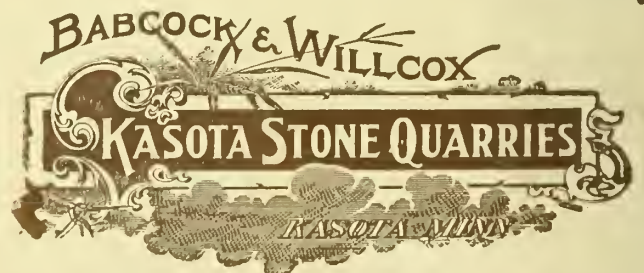
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